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**FINAL DRAFT
PRELIMINARY ASSESSMENT
AT & T BELL LABORATORIES - HOLMDEL FACILITIES
HOLMDEL, NEW JERSEY**

**FIELD INVESTIGATION TEAM ACTIVITIES AT
UNCONTROLLED HAZARDOUS SUBSTANCES
FACILITIES — ZONE I**

**NUS CORPORATION
SUPERFUND DIVISION**

02-8909-14-PA
REV. NO. 0

FINAL DRAFT
PRELIMINARY ASSESSMENT
AT & T BELL LABORATORIES - HOLMDEL FACILITIES
HOLMDEL, NEW JERSEY

PREPARED UNDER

TECHNICAL DIRECTIVE DOCUMENT NO. 02-8909-14
CONTRACT NO. 68-01-7346

FOR THE

ENVIRONMENTAL SERVICES DIVISION
U.S. ENVIRONMENTAL PROTECTION AGENCY

OCTOBER 19, 1989

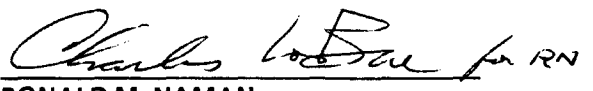
NUS CORPORATION
SUPERFUND DIVISION

SUBMITTED BY:


ANTHONY F. CULMONE JR.
PROJECT/MANAGER


JAMES FROST
SITE MANAGER

REVIEWED/APPROVED BY:


RONALD M. NAMAN
FACILITY OFFICE MANAGER

POTENTIAL HAZARDOUS WASTE SITE PRELIMINARY ASSESSMENT

PART I: SITE INFORMATION

1. Site Name/Alias AT&T Bell Laboratories-Holmdel Facility
Street Crawfords Corner Road
City Holmdel State New Jersey Zip 07733
2. County Monmouth County Code 025 Cong. Dist. 4
3. EPA ID No. NJD011328887
4. Latitude 40° 21' 50" N Longitude 74° 10' 26" W
USGS Quad. Marlboro, New Jersey
5. Owner AT&T Bell Laboratories Tel. No. (201) 564-2000
Street 101 John F. Kennedy Parkway
City Short Hills State New Jersey Zip 07078-0905
6. Operator AT&T Bell Laboratories Tel. No. (201) 564-2645
Street Crawfords Corner Road
City Holmdel State New Jersey Zip 07733
7. Type of Ownership
☒ Private ☐ Federal ☐ State
☐ County ☐ Municipal ☐ Unknown ☐ Other _____
8. Owner/Operator Notification on File
☒ RCRA 3001 Date 8/18/80 ☐ CERCLA 103c Date _____
☐ None ☐ Unknown
9. Permit Information
- | Permit | Permit No. | Date Issued | Expiration Date | Comments |
|--|---------------------|----------------|-----------------|----------|
| <u>NJDOH*</u>
<u>Sanitary</u> | <u>S-12-59-1007</u> | <u>6/6/60</u> | <u>Unknown</u> | _____ |
| <u>NJDOH*</u>
<u>Industrial</u> | <u>S-2-62-1007A</u> | <u>4/2/62</u> | <u>Unknown</u> | _____ |
| <u>NJDOH*</u>
<u>Sanitary</u> | <u>S-6-64-2227</u> | <u>7/17/64</u> | <u>Unknown</u> | _____ |
| <u>NJDOH*</u>
<u>Industrial</u> | <u>S-2-67-2376</u> | <u>11/68</u> | <u>Unknown</u> | _____ |
| <u>Holmdel Twp.</u>
<u>Sanitary</u> | <u>1394</u> | <u>2/28/67</u> | <u>Unknown</u> | _____ |

<u>NJDOH*</u>	<u>S-9-71-4160</u>	<u>2/4/72</u>	<u>Unknown</u>	<u> </u>
<u>Sanitary Permit</u>				
<u>"Y"***</u>	<u>20298</u>	<u>Unknown</u>	<u>Unknown</u>	<u> </u>
<u>NJPDES</u>	<u>NJ0000477</u>	<u>Unknown</u>	<u>Unknown</u>	<u> </u>
<u>HWMF</u>	<u>1318G1HP01</u>	<u>12/23/88</u>	<u>12/23/93</u>	<u> </u>
<u>NJ Solid Waste Permit</u>	<u>NJSW1211AA</u>	<u>Unknown</u>	<u>Unknown</u>	<u> </u>

* NJDOH is presumed to mean New Jersey Department of Health.

** From NJDEP Printout-Key unavailable and type of permit is unknown.

10. Site Status

☒ Active ☐ Inactive ☐ Unknown

11. Years of Operation 1960 to Present

The 1960 date of operation is when the facility was built. AT&T has indicated in its Part A permit application that operation began or construction commenced on August 1, 1971.

12. Identify the types of waste units (e.g., landfill, surface impoundment, piles, stained soil, above- or below-ground tanks or containers, land treatment, etc.) on site. Initiate as many waste unit numbers as needed to identify all waste sources on site.

(a) Waste Management Areas

Waste Unit No.	Waste Unit Type	Facility Name for Unit
<u>1</u>	<u>Drums</u>	<u>Container (Drum) Storage Area</u>
<u>2</u>	<u>Small Containers</u>	<u>Small Container Storage Area</u>
<u>3</u>	<u>Tank</u>	<u>Tank Storage Area</u>

(b) Other Areas of Concern

Identify any miscellaneous spills, dumping, etc. on site; describe the materials and identify their locations on site.

There have been no reported spills or dumping from any of the units. However, on March 27, 1989 while AT&T was removing an old kerosene underground storage tank from an unspecified location on the property, work crews came upon an unknown gasoline tank. Soil around the tanks was noted to be contaminated with kerosene from the tank which had leaked an unknown quantity. The NJDEP noted in its Notification Report that land and possibly groundwater was contaminated. In its follow-up inspection on March 30, 1989, the NJDEP noted that the tanks had a capacity of 550 gallons each. Plastic was placed over the excavation until further remediation activities could be completed. The report further states that samples of unknown origin and content were analyzed and revealed "contamination as high as 7,000 ppm." The report does not state what parameter is represented by the 7,000 ppm. The NJDEP issued a field Notice of Violation (NOV) for this incident. On April 7, 1989, AT&T submitted a follow-up report which verifies the above except for the lab results which they said "showed total petroleum hydrocarbons over 100 ppm at the four sampling locations and one sampling location with benzene, toluene, and xylene (BTX) over 1 ppm at the gasoline tank site." AT&T indicated that remediation would begin shortly. Whether the remediation has been completed is unknown. However, it should be noted that spills such as this are exempt under the petroleum exclusion of the Comprehensive Environmental Responsibility, Compensation and Liability Act (CERCLA).

13. Information available from

Contact <u>Amy Brochu</u>	Agency <u>U.S. EPA</u>	Tel. No. <u>(201) 906-6802</u>
Preparer <u>James Frost</u>	Agency <u>NUS Corp. Region 2 FIT</u>	Date <u>October 19, 1989</u>

PART II: WASTE SOURCE INFORMATION

For each of the waste units identified in Part I, complete the following six items.

Waste Unit 1 - Drums, Container (Drum) Storage Area

1. Identify the RCRA status and permit history, if applicable, and the age of the waste unit.

On August 18, 1980, AT&T filed a Notification of Hazardous Waste Activity. In the Notification, AT&T declared that it had eight hazardous wastes from non-specific sources, fifty-one commercial chemical product hazardous wastes, ignitable wastes, and two 55-gallon drums of waste oil storage.

On November 19, 1980, AT&T filed a Part A permit application. In the application, AT&T stated that it had a process design capacity of 110 gallons for activity SO1 (drums). The application did not identify any wastes that were stored in drums.

On September 4, 1981, the NJDEP performed an inspection at the site. No violations were noted during the inspection and no NOVs were issued.

On August 3, 1983, the NJDEP wrote a letter to confirm the conclusions of a July 29, 1983 meeting between the NJDEP and AT&T. The purpose of the meeting was to discuss how AT&T should handle its satellite facilities in relation to hazardous waste treatment regulations. It was concluded that the smaller facilities would be construed as small quantity generators and that only the Holmdel facility would have to register as a TSD facility since it accepted the wastes from the smaller facilities and held them for longer than ninety days. According to the NJDEP, these wastes from the other facilities did not have to be manifested but a permitted hazardous waste hauler must be used to transport the wastes to the Holmdel facility. It was suggested that AT&T might wish to register one of its trucks for this purpose.

On November 17 or 21, 1983, the NJDEP conducted an inspection at the site. (The inspection form indicates both dates for a one-day inspection). The inspection form identifies the containment system but also identifies a problem with the drums themselves. According to the inspection, "some drums have duct tape covering the posts." The report concluded that this method of closing drums was questionable to prevent the escape of hazardous waste or its vapors. No further discussion of the drums is presented. No NOVs are on record as having been issued as a result of this inspection.

On June 4, 1984, AT&T filed a revised Part A permit application. In this application, AT&T identified several hazardous materials that were drummed and a process design capacity of 975 gallons for this unit.

On June 26, 1984, the NJDEP responded to the application. Although, the application stated that the design capacity is 975 gallons for this unit, the NJDEP letter indicates that the NJDEP accepted the application and identified the unit's capacity as 575 gallons. The letter further states that the NJDEP would request the U.S. EPA to revise its data bank accordingly. On December 6, 1985, the NJDEP requested AT&T to submit a complete New Jersey Hazardous Waste Facility Permit Application.

In May, 1986, AT & T filed a Part B RCRA Permit application which included the 1984 Part A application, sampling data and a description of the processes used at AT&T. The application indicates that the drum storage area is a concrete pad 14.2 feet by 39.5 feet with a curbing 6 inches high. The curbing is only on three sides and the bottom slopes away from the non-curbed side to a collection drain. The drain is connected to the waste storage tank. Drums are stored on the pad on wooden pallets. Other investigations have noted that there is a manually operated valve on the drain which is normally closed, thus directing any liquids on the pad to the waste storage tank. However, this valve may be opened to allow accumulated rainwater to drain to a nearby creek. On September 22, 1986, the NJDEP responded to the permit application indicating there were several deficiencies which needed correction.

On September 26, 1986, the NJDEP conducted an inspection of the site. The notes from the inspection describe the unit, as noted above. No violations concerning the drum storage area were identified. There is no record to indicate that an NOV was issued because of the inspection.

On November 18, 1986, the NJDEP granted AT&T an extension of an October 22, 1986 due date for the submission of soil sampling and other analytical data. The new due date was established as December 3, 1986 for the submission of this data as a part of the Part B Permit Application.

On December 3, 1986, AT&T responded to the NJDEP September 26, 1986 review letter and provided the information that the NJDEP requested in the September review letter. On December 16, 1986, the NJDEP sent a letter to AT&T indicating that the application was now considered administratively complete and provided an estimated schedule for issuing a Hazardous Waste Management Facility (HWMF) permit.

On May 22, 1987, the NJDEP issued another review letter of the permit application. The letter indicates that "all appropriate outside agencies" have reviewed the application and that correction of several deficiencies was needed.

According to a June 8, 1988, letter from the NJDEP, AT&T responded to the May 22, 1987 review letter on August 27, 1988. The exact contents of the August 27, 1987 letter are not known but are presumed to be responses to the NJDEP's review comments. However, the June 8, 1988, letter from the NJDEP indicates that permit application was now considered technically complete.

On August 18, 1988, the NJDEP conducted another inspection. The notes from the inspection indicate that the drum storage unit was in compliance with the provisions of the draft HWMF permit. The notes do not indicate that there were any violations found that were associated with this unit. There is no record to indicate that any NOVs were issued because of this inspection.

On December 23, 1988, the NJDEP issued a HWMF permit to AT&T for the Holmdel facility. The permit number is 1318G1HPO1 and it expires on December 23, 1993. Under Authorized Activities on Page 15 of 31 of the permit, AT&T "is authorized to store on-site generated wastes, as well as wastes generated at company-owned off-site locations, in containers (drums) on the concrete pad . . ." The pad is required to be six inches thick and the drums must be placed on wooden pallets. The permit further states that the control valve on the drain line from the concrete basin shall be kept in the closed position and that it may be opened only to drain the accumulated rainfall only if there are no visible hazardous waste spills and the accumulated liquid is analyzed and meets AT&T's NJPDES permit limits.

On March 31, 1989, the NJDEP conducted an inspection of the site. No environmental violations were noted with this unit. However, a field NOV was issued because AT&T did not conduct semiannual drills with all employees (there are 6,000 or 7,000 employees at this location) and local officials, even though AT&T has its own fire department and its own haz-mat team. The NOV also cited AT&T for not requesting an exemption from the semiannual drills.

On April 11, 1989, the NJDEP approved the facility layout and design of the waste storage areas. Submittal of this information was required by Condition 12 (a) (1) of Section I of the permit.

2. Describe the location of the waste unit and identify clearly on the site map.

From available background information, the unit is located near the entrance to the service road for the laboratory waste treatment plant. The waste treatment plant is about 800 feet west of the main building.

3. **Identify the size or quantity of the waste unit (e.g., area or volume of a landfill or surface impoundment, number and capacity of drums or tanks). Specify the quantity of hazardous substances in the waste unit.**

Several observations of the quantity of wastes in this unit have been made. Obviously, these quantities will vary based upon wastes on hand during the NJDEP inspections. However, the capacities identified in permit applications and responses from the NJDEP also vary causing some confusion. For the purposes of this report, the permitted capacity of this unit will be used, which is 935 gallons or seventeen 55 gallon drums. The following is a summary of observations by the NJDEP and reports by AT&T concerning quantities and capacities associated with this unit.

1. On August 18, 1980, AT&T stated in a Part A permit application that it had a process design capacity of 110 gallons. No estimated annual quantities were given for this unit.
 2. On September 4, 1981, the NJDEP observed five 60-gallon drums of plating solution.
 3. A NJDEP computer printout identifies the process design capacity as 575 gallons on March 2, 1983.
 4. On November 21, 1983, ten 55-gallon drums of corrosives were observed during an NJDEP inspection.
 5. On June 4, 1984, AT&T identified a process design capacity of 975 gallons for this unit and an estimated annual quantity of 22,520 pounds.
 6. On June 26, 1984, the NJDEP identified the capacity of the unit as 575 gallons in a letter.
 7. In the May, 1986 Part B Permit Application, AT&T stated the design capacity as 575 gallons.
 8. On September 26, 1986, the NJDEP observed eight 55-gallon drums in the unit during an inspection.
 9. On December 3, 1986, on page 15-1 of the Closure Plan in the revised Part B permit application, AT&T said the capacity was 950 gallons.
 10. On August 18, 1988, during an inspection, the NJDEP observed thirteen 55-gallon drums.
 11. The HWMF permit, issued December 23, 1988, states the capacity as 935 gallons or seventeen 55-gallon drums or an equivalent in 30-gallon drums.
 12. On March 31, 1989, the NJDEP observed four 55-gallon drums during an inspection.
4. **Identify the physical state(s) of the waste type(s) as disposed of in the waste unit. The physical state(s) should be categorized as follows: solid, powder or fines, sludge, slurry, liquid, or gas.**

All of the wastes stored in this unit are liquids. However, on March 31, 1989, the NJDEP observed one 55-gallon drum of corrosive solids in this unit during an inspection.

5. **Identify specific hazardous substance(s) known or suspected to be present in the waste unit.**

Hazardous substances identified by the NJDEP and AT&T are: spent halogenated solvents; spent nonhalogenated solvents; wastewater treatment plant sludges from electroplating processes; spent cyanide plating bath solutions; cyanide plating bath sludges and bottoms; spent cyanide stripping and cleaning bath solutions; ammonium picrate; barium cyanide; brucine; calcium cyanide; carbon disulfide; cyanides (NOS); potassium cyanide; sodium azide; sodium cyanide; acetone; acetonitrile; chloroform; hydrofluoric acid/hydrogen fluoride; mercury; methyl ethyl ketone; tetrachloromethane; toluene; 1,1,1-trichloroethane; trichloroethene; xylene; corrosives; paint thinner; reactives; flammable liquids; cleaning

liquid; ammonium hydroxide; ammonium chloride; copper; tetrachloroethylene; trichloroethylene; methylene chloride; carbon tetrachloride; chlorobenzene; 1,1,2-trichloro-1,2,2 trifluoroethane; o-dichlorobenzene; trichlorofluoromethane; 1,1,2-trichloroethane; ethyl acetate; ethyl benzene; ethyl ether; methyl isobutyl ketone; n-butyl alcohol; cyclohexanone; methanol; cresols and cresylic acid; nitrobenzene; isobutanol; pyridine; benzene; 2-ethoxyethanol; and 2-nitropropane.

6. Describe the containment of the waste unit as it relates to contaminant migration via groundwater, surface water, and air.

The drum storage area is located on a concrete pad which is bermed to provide containment and because there is the pad and a drain for the pad, soils and groundwater are protected from any leaks or spills. The drain line is provided with a valve to divert flows to either the receiving stream or to the waste storage tank. Thus, through operator error, a discharge to the receiving stream is possible if the valve is left open. Therefore, containment for surface water migration of contaminants from this unit is minimal. The unit is outside and no containment is provided for an air release. Based on the high assumption that the berm is six inches high, the pad provides containment for 2,100 gallons. A more realistic assumption would be to assume an even slope across the pad from zero to six inches and assume an average depth of three inches, thus providing containment for about 1,050 gallons which is still more than the permitted capacity of the unit.

Ref. Nos. 1 through 28, 43, 44

PART II: WASTE SOURCE INFORMATION

For each of the waste units identified in Part I, complete the following six items.

Waste Unit 2 - Small Containers, Small Container Storage Area

1. Identify the RCRA status and permit history, if applicable, and the age of the waste unit.

On August 18, 1980, AT&T filed a Notification of Hazardous Waste Activity. In the Notification AT&T declared that it had eight hazardous wastes, ignitable wastes, and two 55-gallon drums of waste oil.

On November 19, 1980, AT&T filed a Part A Permit Application. The application does not specifically address this unit. This unit stores small quantity wastes from other AT&T facilities until they can be properly disposed. These wastes are generated in small quantities. They are stored in a cabinet and later drummed when ready for disposal. A small drum storage area for waste oil is adjacent to this unit.

On September 4, 1981, the NJDEP conducted an inspection of the site. The notes from the inspection do not specifically address this unit other than to say that the site receives wastes from other AT&T facilities. No violations were observed and there is no record to indicate that any NOV's were issued as a result of the inspection.

On August 3, 1983, the NJDEP issued a letter confirming negotiations with AT&T concerning the small quantity wastes received from other AT&T facilities. The letter indicates that a revised Part A Permit Application must be submitted to account for these wastes but that the shipments of the wastes to the Holmdel facility do not have to be manifested. A permitted hazardous waste hauler is not needed for the shipment of these wastes but a permitted solid waste hauler is required.

On November 21, 1983, the NJDEP observed about 100 bottles in lab packs and an unspecified amount of waste oil. No other observations of this unit were made and there is no record to indicate that any violations were found. No NOV's were issued as a result of this inspection.

The June 4, 1984 revised Part A Permit Application submitted by AT&T addresses this unit. Eleven hazardous substances are identified in the application. The Part B application, submitted in May 1986, contains a revised Part A application which identifies only four hazardous substances and waste oil in this unit. The narrative in this application also indicates that this unit consists of two masonry block rooms and one flammable liquid storage cabinet. It also states that this unit receives small amounts of waste chemicals from miscellaneous laboratory operations within the Holmdel facility. The materials are periodically packaged (lab packed) by an outside contractor for treatment or disposal.

On September 22, 1986, the NJDEP sent a review letter to AT&T indicating that the application was not approved. A number of deficiencies were noted and AT&T was given 30 days to provide the additional information.

On September 26, 1986, the NJDEP made an inspection of the site. Notes from the inspection reveal that this unit is "... located within the laboratory wastewater treatment facility. The area consists of two masonry block rooms and one flammable liquid storage cabinet. In the same area but outside the building waste oil is stored in a ten foot by ten foot metal shed with 4 inch curbing for containment." The chemical wastes are derived from laboratories within the Holmdel facility and waste oils are generated from servicing vacuum pumps, air compressors, and vehicles. No further observations are noted and no violations are discussed in the notes. There is no record to indicate that an NOV was issued as a result of this inspection.

On November 18, 1986, the NJDEP granted an extension of time to AT&T to submit the revised Part B permit application. The new submission date was set at December 3, 1986. On December 3, 1986, AT&T submitted the additional information in a revised Part B Permit Application. The narrative of the application indicates that an exhaust system for the masonry block rooms and the storage cabinet is provided. The exhaust system is vented to the outside atmosphere and safety equipment is provided in an adjacent room. The application also identified a closure plan for this unit.

On December 16, 1986, the NJDEP sent AT&T a letter stating that the application was administratively complete. The letter proposes a schedule for issuing a permit including performing a technical review of the application. On May 22, 1987, the NJDEP sent a technical review letter on the application. Thirteen deficiencies, some with several subparts, were listed. On June 8, 1988, the NJDEP wrote a letter referencing an August 27, 1987 submittal by AT&T. Apparently in August, AT&T submitted the requested information and the purpose of this June 8, 1988 letter was to state that the application was now technically complete.

On August 18, 1984, the NJDEP conducted another inspection of the site. The notes of the inspection indicate that "... AT&T is in compliance with conditions of the draft permit ..." No violations were noted and there is no record to indicate that any NOVs were issued as a result of this inspection. However, discussions during the inspection must have included AT&T's shipment of wastes from other sites since an August 29, 1988 letter responds to this issue.

On December 23, 1988, the NJDEP issued a HWMF permit to AT&T. The permit authorizes AT&T to store hazardous waste in small containers and to receive wastes from the Crawford Hill, Middletown and Red Hill facilities. The permit allows forty gallons of liquids, semiliquids, semisolids and solids to be stored in masonry room No. 1 for acids and oxidizers. Forty gallons of liquids, semiliquids, semisolids and solids are allowed to be stored in masonry room No. 2 for caustics and cyanides. Finally, fifteen gallons of flammables and reactives are allowed to be stored in the flammable liquids storage cabinet. The permit requires adequate containment for all spills within this unit. The permit does not specifically address the waste oil storage area in this unit but does allow waste oils to be stored in the unit.

On March 31, 1989, the NJDEP performed an inspection of the site. The unit was found to be in compliance with all rules except those pertaining to semiannual drills and coordination with local authorities. A field NOV was issued for these nonenvironmental violations. The notes also provide an eight page log of the contents of the two rooms and the cabinet.

On April 11, 1989, the NJDEP issued a letter approving AT&T's site layout and design of the hazardous waste storage area. This submittal was made to fulfill Condition 12 (a) (1) of Section I of the HWMF permit.

2. Describe the location of the waste unit and identify clearly on the site map.

The masonry rooms and the storage cabinet are located inside the laboratory waste treatment building which is about 800 feet west of the main building. The oil storage area is located outside the building adjacent to the masonry rooms. The exact location of the portion of the unit inside the building is unknown.

3. Identify the size or quantity of the waste unit (e.g., area or volume of a landfill or surface impoundment, number and capacity of drums or tanks). Specify the quantity of hazardous substances in the waste unit.

The permit allows forty gallons of wastes to be stored in Room No. 1, forty gallons in Room No. 2 and fifteen gallons in the flammable storage cabinet. The waste oil storage is unspecified. The greatest quantity of waste oil that had been observed by the NJDEP was two drums.

4. Identify the physical state(s) of the waste type(s) as disposed of in the waste unit. The physical state(s) should be categorized as follows: solid, powder or fines, sludge, slurry, liquid, or gas.

The permit allows liquids, semiliquids, semisolids and solids to be stored in this unit.

5. Identify specific hazardous substance(s) known or suspected to be present in the waste unit.

The HWMF permit allows storage of the following hazardous wastes: ignitables; corrosives; reactives (potassium borohydride, rubidium, barium, sodium in solvent, calcium turnings, and magnesium powder); EP toxic arsenic; EP toxic barium; EP toxic cadmium; EP toxic chromium; EP toxic lead; EP toxic mercury; EP toxic selenium; EP toxic silver; tetrachloroethylene; methylene chloride; 1,1,1-trichloroethane; carbon tetrachloride; chlorinated fluorocarbons; trichloroethylene; chlorobenzene; 1,1,2-trichloro-1,2,2-trifluoroethane, o-dichlorobenzene; trichlorofluoromethane; 1,1,2-trichloroethane; xylene; acetone; ethyl acetate; ethyl benzene; ethyl ether; methyl isobutyl ketone; n-butyl alcohol; cyclohexanone; methanol; cresols and cresylic acid; nitrobenzene; toluene; methyl ethyl ketone; carbon disulfide; isobutanol; pyridine; benzene; 2-ethoxyethanol; 2-nitropropane; spent cyanide plating solutions from electroplating operations; waste automotive and crankcase oil; oil spill cleanup residues; metal working oils; turbine lubricating oil; diesel lubricating oils; quenching oils; waste oil from electric transformers with less than 50 ppm polychlorinated biphenyls (PCBs); any discarded or off-spec commercial chemical products; packed laboratory chemicals; nonhazardous liquid waste; nonhazardous solid waste; and poisons and pesticides NOS.

6. Describe the containment of the waste unit as it relates to contaminant migration via groundwater, surface water, and air.

The portions of the unit located inside the building are provided with containment and, thus, adequate containment is provided for both groundwater and surface water migration pathways. Forced ventilation is provided for the indoor portions but they are vented to the outside. Therefore, no containment is provided for the air pathway. The waste oil storage area is in a metal shed on a concrete pad with a four inch berm. With the dimensions of the shed being 10 feet by 10 feet, containment for about 250 gallons is provided. This is adequate to protect against migration to surface or groundwater pathways. No containment is provided for air.

Ref. Nos. 1 through 28

PART II: WASTE SOURCE INFORMATION

For each of the waste units identified in Part I, complete the following six items.

Waste Unit 3 - Tank, Tank Storage Area

1. Identify the RCRA status and permit history, if applicable, and the age of the waste unit.

On August 18, 1980, AT&T filed a Notification of Hazardous Waste Activity. In the Notification, AT&T declared that it had eight hazardous wastes from non-specific sources, fifty-one commercial chemical product hazardous wastes, ignitable wastes, and two 55-gallon drums of waste oil storage.

On November 19, 1980, AT&T filed a Part A Permit Application. It stated the capacity of the unit is 6,000 gallons and estimated the annual quantity of waste in this unit as 7,153 pounds.

On September 4, 1981, the NJDEP conducted an inspection of the site. Notes from the inspection do not indicate that there were any violations and the record does not indicate that any NOV's were issued as a result of the inspection.

On November 21, 1983, the NJDEP conducted an inspection of the site. No violations were noted during the inspection concerning this unit and there is no record to indicate that any NOV's were issued as a result of this inspection.

On June 4, 1984, AT&T refilled its Part A Permit Application. In this application AT&T claimed that the capacity of the tank remained unchanged but that the estimated annual quantity of waste in this unit increased from 7,153 pounds to 42,500 pounds. On June 26, 1984, the NJDEP accepted this revised application and requested that the U.S. EPA revise its data bank.

On December 6, 1985, the NJDEP requested AT&T to revise its Part A Permit Application to comply with New Jersey law. AT&T was given three months to submit portions of the revised application and six months to submit the other portions. In May 1986, AT&T submitted the requested information with no changes concerning this unit. The narrative in the application indicated that the tank is lined, made of steel and located below grade in a vault which is 21 ft by 11 ft by 12.5 ft deep. The vault is made of concrete which is fourteen inches thick and epoxy coated inside and outside. The vault has a sump and a forced ventilation system. A steel grate covers the vault and the vault area is roofed but there are no sides to the covering structure. The tank, according to the applications, receives wastes from the main building laboratories and these wastes are manually poured into the tank.

On September 22, 1986, the NJDEP issued a review letter stating that further information was needed. Numerous deficiencies were noted and AT&T was given 30 days in which to reply and submit the requested data.

On September 26, 1986, the NJDEP conducted an inspection of the site. No violations were found associated with this unit and the record does not indicate that any NOV's were issued as a result of the inspection.

On November 18, 1986, the NJDEP wrote a letter to AT&T granting an extension for the submission of additional data for the Part B Permit Application. The extension to December 3, 1986 was needed so that AT&T could submit a soil sampling and analytical data plan.

On December 3, 1986, AT&T submitted the data requested in the NJDEP's September 22, 1986 review letter. AT&T responded to each item in the review letter and provided a revised Part B permit application. The revised application does not provide any new information on this unit.

On December 16, 1986, the NJDEP issued a review letter on the application. The letter indicates that the application was administratively complete and outlines a schedule for issuance of a HWMF permit.

On May 22, 1987, the NJDEP issued a technical review letter to AT&T. The letter identifies thirteen deficiencies which need correction. A June 8, 1988, review letter from the NJDEP indicates that AT&T responded to the review comments on August 27, 1987. The June 8, 1988, review letter indicates that the Part B permit application. "... can be considered technically complete."

On August 18, 1988, the NJDEP performed an inspection of the site. Notes from the inspection indicate that AT&T was in compliance with the terms and conditions of the draft permit. No violations were noted during the inspection and the record does not indicate that any NOV's were issued as a result of this inspection.

On December 23, 1988, the NJDEP issued a HWMF permit to AT&T. The permit allows the use of this unit subject to many conditions such as roofing, lining and shell thickness requirements, and training reporting requirements.

On March 27, 1989, gasoline and kerosene tanks were being unearthed. These tanks are not a part of this unit. The NJDEP made an inspection of the tanks and issued a field NOV for this incident. AT&T responded to the NOV on April 7, 1989 as to their actions and intentions. For further information on this incident, please see Part I, Item 12 (b).

On March 31, 1989, the NJDEP conducted another inspection of the site. The notes of the inspection identified no environmental problems with this unit. The inspector noted that semi-annual drills are not conducted with all staff and there is not adequate coordination with local officials. A field NOV was issued for these violations.

On April 11, 1989, the NJDEP approved the facility layout and design of the hazardous waste storage areas, including this unit. These designs were submitted by AT&T as required by the HWMF permit.

2. Describe the location of the waste unit and identify clearly on the site map.

According to data submitted by AT&T, the unit is located just south of the intersection of the ring (oval-shaped) drive around the main building and the service road to the laboratory waste treatment plant.

3. Identify the size or quantity of the waste unit (e.g., area or volume of a landfill or surface impoundment, number and capacity of drums or tanks). Specify the quantity of hazardous substances in the waste unit.

This unit has a permitted capacity of 6,000 gallons. The largest volume of waste observed in this unit by the NJDEP is 5,000 gallons.

4. Identify the physical state(s) of the waste type(s) as disposed of in the waste unit. The physical state(s) should be categorized as follows: solid, powder or fines, sludge, slurry, liquid, or gas.

The physical state of all substances in this unit is liquid.

5. Identify specific hazardous substance(s) known or suspected to be present in the waste unit.

AT&T is authorized to store the following wastes in this unit: rinse waters and aqueous wastes generated on-site and wastes generated off-site; corrosives; EP toxic arsenic; EP toxic barium; EP toxic cadmium; EP toxic chromium; EP toxic lead; EP toxic mercury; EP toxic selenium; EP toxic silver; and nonhazardous liquid waste.

6. Describe the containment of the waste unit as it relates to contaminant migration via groundwater, surface water, and air.

The tank is epoxy-lined and in a below grade vault. The vault is also coated inside and out and is fourteen inches thick. The vault has a sump and its volume can hold the entire contents of the tank. Therefore, adequate containment for surface and groundwater pathways is provided. The tank is essentially open to the air. It is covered with a grate and a roof. A forced ventilation system is provided for personnel entering the vault and this is vented to the atmosphere. No containment is provided for the air pathway.

Ref. Nos. 1 through 28

PART III: HAZARD ASSESSMENT

GROUNDWATER ROUTE

1. **Describe the likelihood of a release of contaminant(s) to the groundwater as follows: observed, alleged, potential, or none. Identify the contaminant(s) detected or suspected, and provide a rationale for attributing the contaminant(s) to the facility.**

The likelihood of a release to groundwater from any of the permitted units is rated as none. The drums are stored on a concrete pad which is bermed. The small container storage area is inside a building and the 6,000 gallon tank is in a 14 inch thick vault. Containment is provided for each unit to prevent any leaks to the ground. However, AT&T has had a release from a leak in a kerosene tank. The current status of that situation is unknown.

Ref. Nos. 2, 3, 6, 10, 12, 14, 18, 20, 21, 22, 23, 24, 25, 26, 28

2. **Describe the aquifer of concern; include information such as depth, thickness, geologic composition, permeability, overlying strata, confining layers, interconnections, discontinuities, depth to water table, groundwater flow direction.**

Monmouth County lies on the Atlantic Coastal Plain. It is underlain by unconsolidated sediments of Mesozoic and Cenozoic age. The Coastal Plain sediments, which are marine in origin, range from 500 feet thick in the northwestern part of the county to more than 1,200 feet thick in the southeastern part of the county. These sediments consist of sands, silts and clays and green sands or glauconitic sands with interspersed gravel beds. There does not appear to be any confining layers between the surface and bedrock which is about 600 to 700 below the surface in this area.

A well log of the nearest well to AT&T's property reveals the following:

<u>Cretaceous</u>	<u>Thickness (feet)</u>	<u>Depth (feet)</u>
Red Bank Sand	10	10
Navesink Marl	20	30
Wenonah and Mt. Laurel Sands	80	110
Marshalltown Formation (sand and clay)	30	140
Englishtown Sand	70	210

According to data from the U.S. Geological Survey, this same well has a static water level of 50 feet below the surface. Other wells in the immediate vicinity off of AT&T's property have static water levels ranging from 43 to 75 feet below the surface. The direction of groundwater flow is unknown, but is presumed to be in a southerly direction due to surface topography.

Ref. Nos. 14, 30, 31

3. **Is a designated sole source aquifer within 3 miles of the site?**

The site lies on the New Jersey Coastal Plain Aquifer System which was designated a sole source aquifer on June 24, 1988.

Ref. No. 33

4. **What is the depth from the lowest point of waste disposal/storage to the highest seasonal level of the saturated zone of the aquifer of concern?**

The depth from the lowest point of storage, which is the 6,000 gallon tank, 12.5 feet below grade, to static water level is 37.5 feet.

Ref. Nos. 14, 30

5. What is the permeability value of the least permeable continuous intervening stratum between the ground surface and the aquifer of concern?

The permeability value of the least permeable stratum is 10^{-5} to 10^{-7} cm/sec.

Ref. No. 34

6. What is the net precipitation for the area?

The net precipitation is estimated to be 11.5 inches.

Ref. No. 34

7. Identify uses of groundwater within 3 miles of the site (i.e., private drinking source, municipal source, commercial, industrial, irrigation, unusable).

Groundwater is used for domestic, commercial, industrial and irrigational purposes.

Ref. Nos. 35, 36

8. What is the distance to and depth of the nearest well that is currently used for drinking or irrigation purposes?

Distance 0.7 mile Depth 210 feet

The nearest well is the Harding well which is southeast of the site.

Ref. No. 14

9. Identify the population served by the aquifer of concern within a 3-mile radius of the site.

Only five to ten percent of water used for domestic purposes comes from ground water for the New Jersey American Water Company. This company serves about 500,000 people in this area but has no wells within three miles of the site. The Shoreland Water Company gets all of its water from wells and it serves Holmdel. Shoreland serves about 35,000 people. None of Shoreland's wells are within three miles of the site. Seven private wells exist within one mile of the site. Assuming 3.5 persons per home, about 25 people are served by private wells within one mile of the site. Also, the Matawan Township Municipal Utility Authority and the New Jersey Highway Authority have wells within three miles of the site. The service population for the Highway Authority is unknown but Matawan services 2,500 customers.

Ref. Nos. 14, 21, 35, 36, 45

SURFACE WATER ROUTE

10. Describe the likelihood of a release of contaminant(s) to surface water as follows: observed, alleged, potential, or none. Identify the contaminant(s) detected or suspected, and provide a rationale for attributing the contaminants to the facility.

The potential of a release to surface water from the 6,000 gallon tank and the small container storage area is rated as none. However, the potential exists for a release from the drum storage area. The drain line from the concrete pad is valved with a manually operated valve. The valve is to be kept closed, thus, directing flows on the pad to the 6,000 gallon waste storage tank. However, the valve may be opened to allow flows to be directed to the receiving stream. AT&T is permitted to discharge accumulated rainfall from the pad to the receiving stream; however, operator error is possible, thus, allowing the discharge of contaminants to the stream.

Ref. Nos. 2, 3, 6, 10, 12, 14, 18, 20, 21, 22, 23, 24, 25, 26, 28

- 11. Identify and locate the nearest downslope surface water. If possible, include a description of possible surface drainage patterns from the site.**

Depending upon the source of data used, the nearest downstream waterway is an unnamed tributary of Hop Brook (USGS topo map) or an unnamed tributary of Ramanessin Brook (Hagstorm Monmouth County map). They appear to be different names for the same waterway. The unnamed tributary appears to be about 250 feet to the southeast from the site according to USGS maps. AT&T has referred to the receiving stream as Ramanessin Brook in its permit applications.

Ref. Nos. 37, 38

- 12. What is the facility slope in percent? (Facility slope is measured from the highest point of deposited hazardous waste to the most downhill point of the waste area or to where contamination is detected.)**

The facility slope is estimated to be eight percent from USGS topo maps.

$$\frac{120 \text{ ft MSL} - 100 \text{ ft MSL}}{250 \text{ ft}} \times 100 = 8\%$$

Ref. No. 37

- 13. What is the slope of the intervening terrain in percent? (Intervening terrain slope is measured from the most downhill point of the waste area to the probable point of entry to surface water.)**

The slope of the intervening terrain is estimated to be twelve percent.

$$\frac{120 \text{ ft MSL} - 90 \text{ ft MSL}}{250 \text{ ft.}} \times 100 = 12\%$$

Ref. No. 37

- 14. What is the 1-year 24-hour rainfall?**

The 1-year 24-hour rainfall is estimated to be about 2.75 inches.

Ref. No. 34

- 15. What is the distance to the nearest downslope surface water? Measure the distance along a course that runoff can be expected to follow.**

The distance to the unnamed tributary to Ramanessin (Hop) Brook is estimated to be 250 feet.

Ref. Nos. 37, 38

- 16. Identify uses of surface waters within 3 miles downstream of the site (i.e., drinking, irrigation, recreation, commercial, industrial, not used).**

The receiving stream enters Swimming River Reservoir about 2.8 miles downstream of the site. The reservoir is used as a primary drinking water source and for recreation. The State of New Jersey has designated the following uses for Ramanessin (Hop) Brook: maintenance, migration and propagation of the natural and established biota; primary and secondary recreation; industrial and agricultural water supply; public potable water supply after such treatment as required by law; and, any other reasonable uses. It is also intended to be a trout maintenance stream.

Ref. Nos. 31, 32, 35

- 17. Describe any wetlands, greater than 5 acres in area, within 2 miles downstream of the site. Include whether it is a freshwater or coastal wetland.**

Portions of Hop Brook (USGS designation) have been identified as a palustrine, forested, broad-leaved, deciduous wetland. Also, approximately 2.0 miles from the site, prior to entry into Swimming River reservoir, the stream discharges into a swamp.

Ref. Nos. 37, 39

- 18. Describe any critical habitats of federally listed endangered species within 2 miles of the site along the migration path.**

There is no record of any federally listed endangered species within 2 miles of the site.

Ref. Nos. 31, 40

- 19. What is the distance to the nearest sensitive environment along or contiguous to the migration path (if any exist within 2 miles)?**

The distance to the nearest sensitive environment, a freshwater wetland contiguous to the migration path, is about 1,000 feet.

Ref. No. 39

- 20. Identify the population served or acres of food crops irrigated by surface water intakes within 3 miles downstream of the site and the distance to the intake(s).**

Swimming River Reservoir is about 2.8 miles downstream; however, the intake is about 5.7 miles downstream. New Jersey American Water Company serves about 500,000 people from this plant.

Ref. Nos. 35, 37

- 21. What is the state water quality classification of the water body of concern?**

Ramanessin (Hop) Brook is classified FW2-TM which means it is a fresh water stream intended to support trout throughout the year.

Ref. Nos. 41

- 22. Describe any apparent biota contamination that is attributable to the site.**

No biota contamination attributable to this site has been noted.

Ref. Nos. 3, 6, 12, 18, 26, 29

AIR ROUTE

- 23. Describe the likelihood of a release of contaminant(s) to the air as follows: observed, alleged, potential, none. Identify the contaminant(s) detected or suspected, and provide a rationale for attributing the contaminant(s) to the facility.**

There is little potential for a release to air. Even though drums are stored outside and units are vented (by forced ventilation) to the outside, there is no record to indicate that adequate containment has not been provided. The tanks and the drums have not been noted to be in bad condition.

Ref. Nos. 3, 6, 12, 18, 26

24. What is the population within a 4-mile radius of the site?

The population within a 4-mile radius is estimated to be about 43,400 people.

Ref. No. 42

FIRE AND EXPLOSION

25. Describe the potential for a fire or explosion to occur with respect to the hazardous substance(s) known or suspected to be present on site. Identify the hazardous substance(s) and the method of storage or containment associated with each.

The potential for fire or explosion is low. Flammable liquids are kept in a special cabinet for this purpose and incompatible wastes are segregated. AT&T has its own fire department and hazmat team.

Ref. Nos. 3, 6, 12, 14, 18, 26

26. What is the population within a 2-mile radius of the hazardous substance(s) at the facility?

The population within a 2-mile radius is estimated to be about 4,600 people.

Ref. No. 42

DIRECT CONTACT/ON-SITE EXPOSURE

27. Describe the potential for direct contact with hazardous substance(s) stored in any of the waste units on site or deposited in on-site soils. Identify the hazardous substance(s) and the accessibility of the waste unit.

The potential for direct contact is considered low. All of the units are about 0.25 mile from the nearest public road. All of the units are either inside a building or shed or are fenced with six foot high chain link fence. Security is provided 24 hours per day and security personnel would be able to see any unauthorized personnel on the grounds due to the size of the facility and the conditions in which the grounds are kept.

Ref. Nos. 3, 6, 12, 14, 18, 26, 29

28. How many residents live on a property whose boundaries encompass any part of an area contaminated by the site?

The only contamination which is alleged to have occurred, is the kerosene leak investigated on March 30, 1989. The current status of this situation is unknown. There are no homes near any of the units.

Ref. No. 22, 23, 29

29. What is the population within a 1-mile radius of the site?

The population within a 1-mile radius is estimated to be about 670 people.

Ref. No. 42

PART IV: SITE SUMMARY AND RECOMMENDATIONS

AT&T Bell Laboratories is located on a 500 acre tract on Crawfords Corner Road in Holmdel, Monmouth County, New Jersey. The facility is claimed to be the largest telecommunications research and development laboratory in the world. The waste site is active and AT&T admits in its filings for permit applications that it does not anticipate closing the site in the foreseeable future. According to the AT&T filings, the laboratory was built in 1960 but transport, storage, and disposal facility (TSDF) activities were reported to have begun in 1971.

The area of concern is located, according to AT&T and NJDEP data, towards the rear of the property. The site contains three waste units: a drum storage area, a 6,000 gallon waste storage tank, and a small container storage area. Wastes are only stored at the site until these wastes are manifested and disposed of off-site. Wastes stored at the site are solvents, paint thinners, plating material, waste oils and small quantities of wastes from other AT&T facilities. The facility has received a New Jersey Pollution Discharge Elimination System permit, local sanitary discharge permit, and New Jersey sanitary and industrial permits.

The site was also permitted by the NJDEP on December 23, 1988 under Hazardous Waste Management Facility Permit 1318G1HP01. The site was permitted for the three units noted above. No environmental violations have been noted during any inspections by the NJDEP. However, on March 31, 1989, the NJDEP noted that AT&T does not hold semiannual drills with all employees and does not coordinate with local officials. It should be noted that the main building which houses the approximately 6,000 employees is about 1,000 feet from the waste site and that AT&T has its own fire department and haz-mat team. AT&T was issued an NOV for these violations. The status of resolving these violations is unknown.

On March 27, 1989, AT&T was removing an abandoned 550 gallon kerosene tank and encountered another abandoned 550 gallon tank that had been used for storing gasoline. AT&T notified the NJDEP that soil contamination in the area of the tanks had occurred. The NJDEP investigation notes do not indicate the location of these tanks but does state that soil samples were taken. The notes further indicate that "results came back with contamination as high as 7,000 ppm." The parameters which were analyzed are unknown. In a letter discussing this incident, AT&T reported sample analyses which showed total petroleum hydrocarbons over 100 ppm at four sampling locations and "... BTX over 1 ppm at the gasoline tank site." The NJDEP issued a field NOV for the incident. The status of remediation is unknown and the incident is excluded from CERCLA consideration because of the petroleum exclusion provision.

The potential for direct contact by any unauthorized personnel is low. The facility is very large, 24-hour security is provided, and any unauthorized personnel on the facility grounds would be stopped prior to gaining access to any buildings. The waste units are either inside buildings, sheds, or are fenced within a six foot high chain link fenced area.

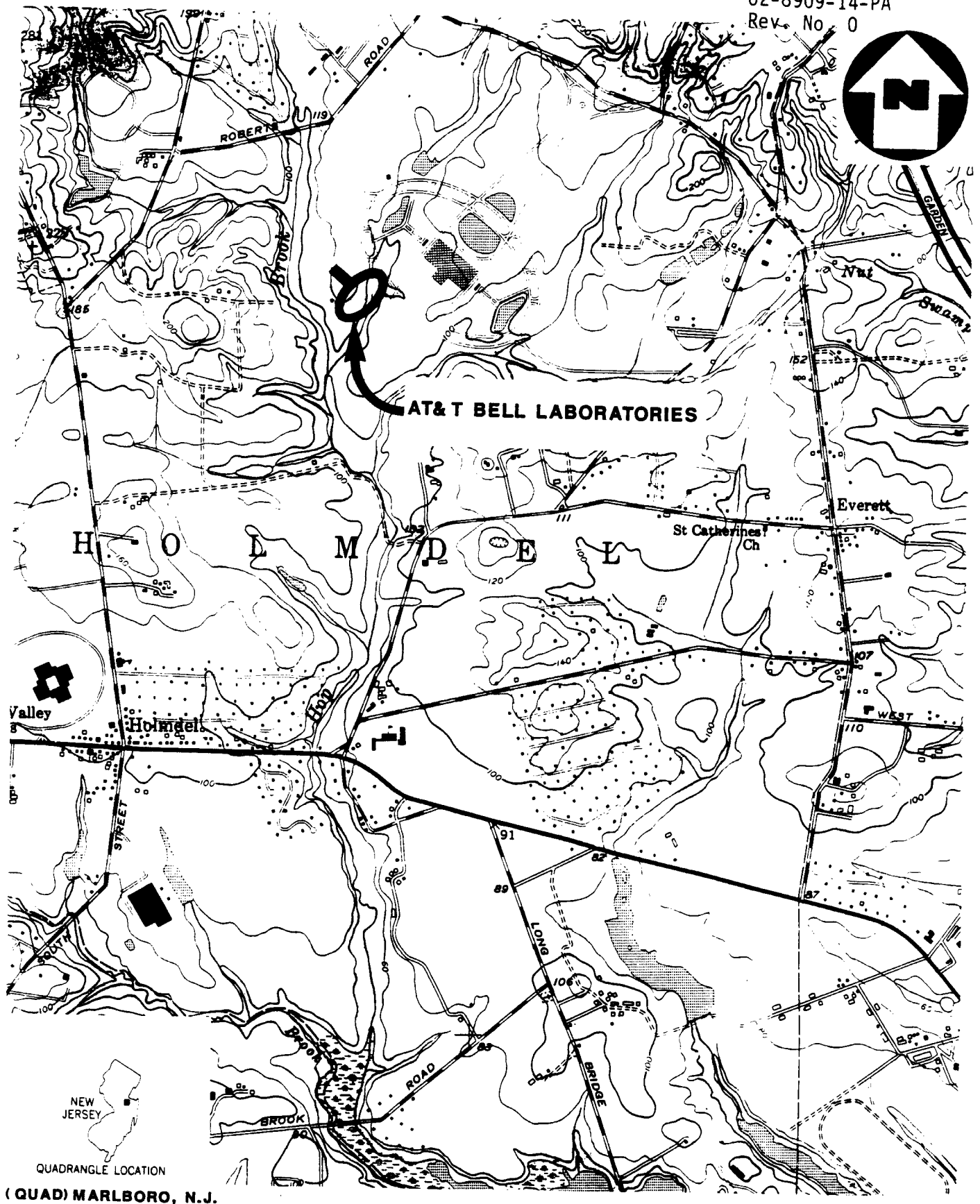
Other than the incident noted above, AT&T has no clean-up actions initiated or scheduled. No enforcement actions are known to have been initiated. Because of the nature of the site and its history of operation, a recommendation of **NO FURTHER REMEDIAL ACTION PLANNED** is made.

ATTACHMENT 1

**AT & T BELL LABORATORIES-HOLMDEL
HOLMDEL, NEW JERSEY**

CONTENTS

Figure 1:	Site Location Map
Figure 2:	Site Map
Exhibit A:	Photograph Log



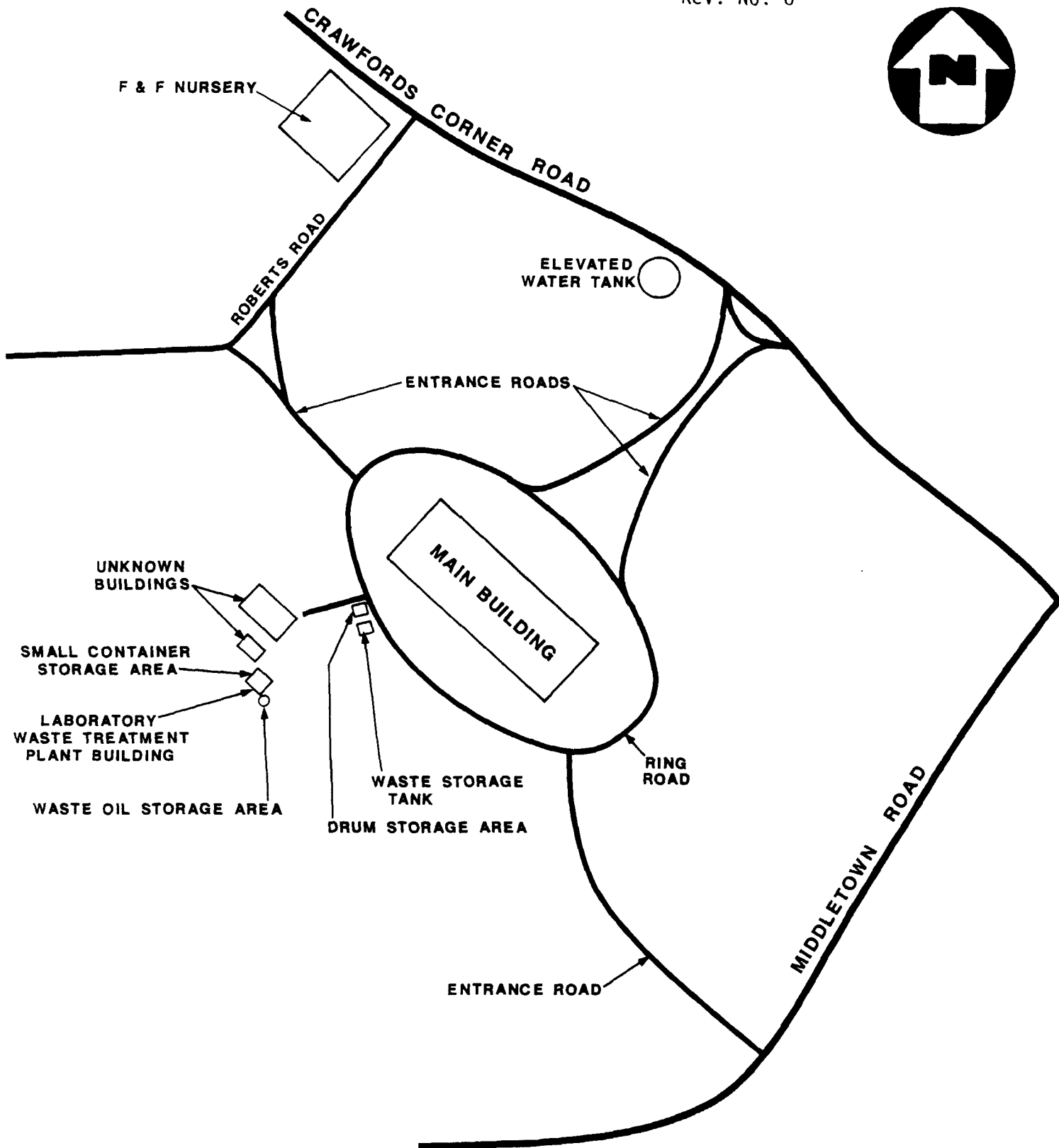
SITE LOCATION MAP

AT&T BELL LABORATORIES, HOLMDEL, N.J.

SCALE: 1" = 2000'

FIGURE 1





SITE MAP

AT&T BELL LABORATORIES, HOLMDEL, N.J.

NOT TO SCALE

FIGURE 2



EXHIBIT A
PHOTOGRAPH LOG
AT&T BELL LABORATORIES-HOLMDEL
HOLMDEL, NEW JERSEY
SEPTEMBER 26, 1989

AT&T BELL LABORATORIES-HOLMDEL
HOLMDEL, NEW JERSEY
SEPTEMBER 26, 1989

PHOTOGRAPH INDEX

<u>Photo Number</u>	<u>Description</u>	<u>Time</u>
P-4	Looking SSE toward west side of facility.	0958
P-5	Looking W at east entrance of facility.	1010
P-6	Looking SW at main entrance of facility.	1014
P-7	Entrance of Swimming River Treatment Plant.	1035

ALL PHOTOGRAPHS TAKEN BY J. FROST.



P-4

September 26, 1989

0958

Looking SSE toward the west side of the facility.



P-5

September 26, 1989

1010

Looking W at east entrance of facility.



P-6

September 26, 1989

1014

Looking SW at the main entrance to the facility.



P-7

September 26, 1989

1035

Entrance of Swimming River Treatment Plant.

ATTACHMENT 2

REFERENCES

1. U.S. EPA, Notification of Hazardous Waste Activity, EPA Form 8700-12 (6-80), August 18, 1980.
2. U.S. EPA General Information, Consolidated Permits Program, EPA Form 3510-1 (6-80), November 19, 1980.
3. RCRA Generator Inspection Form, Prepared by Tom Downey of NJDEP, September 4, 1981.
4. NJDEP, HWDMS Master Facility Listing, March 2, 1983.
5. Letter from Frank Coolick, Chief, Bureau of Hazardous Waste Engineering, NJDEP, to Paul E. Wyszowski, Bell Laboratories, August 3, 1983.
6. NJDEP Inspection Form, Prepared by Kevin F. Gashlin, NJDEP, November 21, 1983.
7. U.S. EPA, General Information, Consolidated Permits Program, EPA Form 3510-1 (6-80), June 4, 1984.
8. Letter from Frank Coolick, Chief, Bureau of Hazardous Waste Engineering, NJDEP, to Paul E. Wyszowski, Group Supervisor, Environmental Management Group, AT & T Bell Laboratories, June 26, 1984.
9. Letter from Edward J. Londres, Assistant Director, Engineering, NJDEP, to Paul E. Wyszowski, Group Supervisor, Environmental Management Group, AT & T Bell Laboratories, December 6, 1985.
10. U.S. EPA Part B RCRA Permit Application, May 1986.
11. Letter from Ernest J. Kuhlwein, Acting Chief, Bureau of Hazardous Waste Engineering, to Paul E. Wyszowski, Group Supervisor, Environmental Management Group, AT & T Bell Laboratories, September 22, 1986.
12. NJDEP Inspection Report, Form DWM-029 3/84, Prepared by William Zavacky, NJDEP, September 26, 1986.
13. Letter from Ernest J. Kuhlwein, Acting Chief, Bureau of Hazardous Waste Engineering, NJDEP, to Paul E. Wyszowski, Manager, Environmental Management Department, AT & T Bell Laboratories, November 18, 1986.
14. Letter and Revised Part B RCRA Permit Application from Paul E. Wyszowski, Manager, Environmental Management Department, AT & T Bell Laboratories, to Ernest J. Kuhlwein, NJDEP, December 3, 1986.
15. Letter from Ernest J. Kuhlwein, Acting Chief, Bureau of Hazardous Waste Engineering, NJDEP, to Paul E. Wyszowski, Manager, Environmental Management Department, AT & T Bell Laboratories, December 16, 1986.
16. Letter from Ernest J. Kuhlwein, Acting Chief, Bureau of Hazardous Waste Engineering, NJDEP, to Paul E. Wyszowski, Group Supervisor, Environmental Management Group, AT & T Bell Laboratories, May 22, 1987.

REFERENCES (CONT'D)

17. Letter from Ernest J. Kuhlwein, Chief, Bureau of Hazardous Waste Engineering, NJDEP, to Paul E. Wyszowski, Group Supervisor, Environmental Management Group, AT & T Bell Laboratories, June 8, 1988.
18. NJDEP Hazardous Waste Inspection Report, Form DWM-029 Revision:3 01/88, Prepared by Peter Maruhnic, NJDEP, August 18, 1988.
19. Letter from Paul E. Wyszowski, Manager, Environmental Management Department, AT & T Bell Laboratories, to Peter Maruhnic, NJDEP, August 29, 1989.
20. Hazardous Waste Management Facility Permit, Permit No. 1318G1HPO1, NJDEP, Trenton, N.J., December 23, 1988.
21. Telecon Note: Conversation between Water Clerk, Matawan Township Municipal Utilities Authority, and Jim Frost, NUS Corp., October 11, 1989.
22. NJDEP Duty Officer Notification Report, Form DEP-061C 9/88, Case No. 89-03-27-1027, Prepared by 24, NJDEP, March 27, 1989.
23. NJDEP memorandum from Todd King to file, Subject: AT & T Bell Laboratories-Holmdel- Investigation, Case No. 89-03-27-1027, March 30, 1989.
24. Notice of Violation from Todd King to George Bogden, Senior Plant Engineer, AT & T Bell Laboratories, Case No. 89-03-27-1027, March 30, 1989.
25. Letter from Paul E. Wyszowski, Manager Environmental Management Department, AT & T Bell Laboratories, to Todd King, NJDEP, April 7, 1989.
26. NJDEP Hazardous Waste inspection Report, Form DWM-029, Revision: 3, 01/88, Prepared by Peter Maruhnic, NJDEP, March 31, 1989.
27. Notice of Violation from Peter Maurhnic, NJDEP, to Paul E. Wyszowski, Manager, Environmental Management Department, AT & T Bell Laboratories, March 31, 1989.
28. Letter from Thomas Sherman, Acting Chief, Bureau of Hazardous Waste Engineering, NJDEP , to H.L. Graham, Executive Director, R & D Facilities Management Division, AT & T Bell Laboratories, April 11, 1989.
29. Preliminary Assessment Off-Site Reconnaissance Information Reporting Form, AT & T Bell Laboratories-Holmdel, TDD No. 02-8909-14, NUS Corp. Region 2 FIT, Edison, New Jersey, September 26, 1989.
30. Records of Wells and Ground-Water Quality in Monmouth County, New Jersey, New Jersey Department of Conservation and Economic Development, Division of Water Policy and Supply, Water Resources Circular 2, 1959.
31. Natural Features Study for Monmouth County, Monmouth County Environmental Council, April, 1975.

REFERENCES (CONT'D)

32. Monmouth County Unique Areas Study, Monmouth County Environmental Council, December, 1978.
33. Federal Register, Vol. 53, No. 122, Notices, 23791, New Jersey Coastal Plain Aquifer System, New Jersey Sole Source Aquifer; Final Determination, June 24, 1988.
34. Uncontrolled hazardous waste site ranking system, A user's manual, 40 CFR, Part 300, Appendix A, 1986.
35. Telecon Note: Conversation between Jim Scott, New Jersey American Water Company and Joseph Soriano, NUS Corp., September 27, 1989.
36. Telecon Note: Conversation between Michael Walsh, Shoreland Water Company and Joseph Soriano, NUS Corp., October 2, 1989.
37. Three-Mile Vicinity Map based on U.S. Department of the Interior, Geological Survey Topographic Maps, 7.5 minute series, "Marlboro, NJ" Quadrangle, 1954, photorevised 1981; "Long Branch, NJ" Quadrangle, 1954, photorevised, 1981; "Keyport, NJ-NY" Quadrangle, 1954, photorevised, 1970, photoinspected 1977; "Sandy Hook, NJ-NY" Quadrangle, 1954, photorevised 1970.
38. Hagstrom Map of Monmouth County, New Jersey Hagstrom Map Company, Inc., Maspeth, New York, 1986.
39. U.S. Department of Interior, Fish and Wildlife Service, Atlas of National Wetlands Inventory Maps for New Jersey, 1984.
40. Federal Register, 50 CFR, Parts 17.11 and 17.12, Endangered and Threatened Wildlife and Plants, April 10, 1987.
41. Surface Water Classifications, Surface Water Quality Standards, N.J.A.C. 7: 9-4, NJDEP/Division of Water Resources, May, 1985.
42. General Sciences Corporation, Graphical Exposure Modeling System (GEMS). Landover, Maryland, 1986.
43. Telecon Note: Conversation between RCRA Hotline and C. LoBue, NUS Corp., August 22, 1989.
44. Federal Register, Vol. 50, No. 65, Definition of Hazardous Substance, April 4, 1985.
45. New Jersey Department of Environmental Protection, Bureau of Geology and Topography, Water Supply Overlay, Sheet 29, August, 1975, Updated August, 1979.

REFERENCE NO. 1



U.S. ENVIRONMENTAL PROTECTION AGENCY

INSTALLA- TION'S EPA I.D. NO.	NJD011328887
I. NAME OF IN- STALLATION	BELL TELEPHONE LABORATORIES HO CRAWFORDS CORNER RD HOLMDEL, NEW JERSEY 07733
II. INSTALLA- TION MAILING ADDRESS	CRAWFORDS CORNER RD HOLMDEL, NEW JERSEY 07733
III. LOCATION OF INSTAL- LATION	CRAWFORDS CORNER RD HOLMDEL, NEW JERSEY 07733

INSTRUCTIONS: If you received a preprinted label, affix it in the space at left. If any of the information on the label is incorrect, draw a line through it and supply the correct information in the appropriate section below. If the label is complete and correct, leave Items I, II, and III below blank. If you did not receive a preprinted label, complete all items. "Installation" means a single site where hazardous waste is generated, treated, stored and/or disposed of, or a transporter's principal place of business. Please refer to the **INSTRUCTIONS FOR FILING NOTIFICATION** before completing this form. The information requested herein is required by law (*Section 3010 of the Resource Conservation and Recovery Act*).

FOR OFFICIAL USE ONLY

[illegible]

INSTALLATION'S EPA I.D. NUMBER										APPROVED		DATE RECEIVED (yr., mo., & day)				
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1. NAME OF INSTALLATION

B	E	L	L	T	E	L	E	P	H	O	N	E	L	A	B	O	R	A	T	O	R	I	E	S	H	O
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II. INSTALLATION MAILING ADDRESS

STREET OR P.O. BOX																				
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CITY OR TOWN																ST.	ZIP CODE			
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III. LOCATION OF INSTALLATION

STREET OR ROUTE NUMBER	
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C															N	10 77 3 3

IV. INSTALLATION CONTACT

NAME AND TITLE (last, first, & job title)															PHONE NO. (area code & no.)																		
E																																	
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V. OWNERSHIP

A. NAME OF INSTALLATION'S LEGAL OWNER																																					
E																																					
8	B	E	L	L	T	E	L	E	P	H	O	N	E	L	A	B	O	R	A	T	O	R	I	E	S	I	N	C	O	R	P	O	R	A	T	E	D

B. TYPE OF OWNERSHIP (enter the appropriate letter into box)		VI. TYPE OF HAZARDOUS WASTE ACTIVITY (enter "X" in the appropriate box(es))	
F = FEDERAL M = NON-FEDERAL	M	<input checked="" type="checkbox"/> A. GENERATION	<input checked="" type="checkbox"/> B. TRANSPORTATION (complete item VII)
		<input checked="" type="checkbox"/> C. TREAT/STORE/DISPOSE	<input type="checkbox"/> D. UNDERGROUND INJECTION

VII. MODE OF TRANSPORTATION (transporters only - enter "X" in the appropriate box(es))

☐ A. AIR ☐ B. RAIL ☒ C. HIGHWAY ☐ D. WATER ☐ E. OTHER (specify):

VIII. FIRST OR SUBSEQUENT NOTIFICATION

Mark "X" in the appropriate box to indicate whether this is your installation's first notification of hazardous waste activity or a subsequent notification. If this is not your first notification, enter your installation's EPA I.D. Number in the space provided below.

[illegible]IX. DESCRIPTION OF HAZARDOUS WASTES

Please go to the reverse of this form and provide the requested information.

WYJDO1132888721

IX. DESCRIPTION OF HAZARDOUS WASTES (continued from front)

A. HAZARDOUS WASTES FROM NON-SPECIFIC SOURCES. Enter the four-digit number from 40 CFR Part 261.31 for each listed hazardous waste from non-specific sources your installation handles. Use additional sheets if necessary.

1 F 0 0 1	2 F 0 0 2	3 F 0 0 3	4 F 0 0 5	5 F 0 0 6	6 F 0 0 7
7 F 0 0 8	8 F 0 0 9	9	10	11	12

B. HAZARDOUS WASTES FROM SPECIFIC SOURCES. Enter the four-digit number from 40 CFR Part 261.32 for each listed hazardous waste from specific industrial sources your installation handles. Use additional sheets if necessary.

13	14	15	16	17	18
19	20	21	22	23	24
25	26	27	28	29	30

C. COMMERCIAL CHEMICAL PRODUCT HAZARDOUS WASTES. Enter the four-digit number from 40 CFR Part 261.33 for each chemical substance your installation handles which may be a hazardous waste. Use additional sheets if necessary.

31 P 0 0 9	32 P 0 1 3	33 P 0 1 8	34 P 0 2 1	35 P 0 2 2	36 P 0 3 0	U226
37 P 0 5 5	38 P 0 9 8	39 P 1 0 5	40 P 1 0 6	41 U 0 0 3	42 U 0 1 2	U228
43 U 0 4 4	44 U 1 3 4	45 U 1 5 1	46 U 1 5 9	47 U 2 1 1	48 U 2 2 0	U239

D. LISTED INFECTIOUS WASTES. Enter the four-digit number from 40 CFR Part 261.34 for each listed hazardous waste from hospitals, veterinary hospitals, medical and research laboratories your installation handles. Use additional sheets if necessary.

49	50	51	52	53	54
----	----	----	----	----	----

E. CHARACTERISTICS OF NON-LISTED HAZARDOUS WASTES. Mark "X" in the boxes corresponding to the characteristics of non-listed hazardous wastes your installation handles. (See 40 CFR Parts 261.21 - 261.24.)

☐ 1. IGNITABLE
(D001)

☒ 2. CORROSIVE
(D002)

☐ 3. REACTIVE
(D003)

☒ 4. TOXIC
(D006)

X. CERTIFICATION

I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

SIGNATURE

F. J. Lutzky Jr.

NAME & OFFICIAL TITLE (type or print)

F. J. Lutzky, Director
Holmdel, Service Operations

DATE SIGNED

8-18-80

EPA Form 200-12 (6-80) REVERSE

Waste oil storage, two 55 gallon drums

R.P.

REFERENCE NO. 2

FORM 1	EPA	U.S. ENVIRONMENTAL PROTECTION AGENCY GENERAL INFORMATION <i>Consolidated Permits Program</i> <i>(Read the "General Instructions" before starting.)</i>	I. EPA I.D. NUMBER <div style="border: 1px solid black; padding: 2px;"> F N J D 0 1 1 3 2 8 8 8 7 </div>
II. POLLUTANT CHARACTERISTICS		GENERAL INSTRUCTIONS If a preprinted label has been provided, affix it in the designated space. Review the information carefully; if any of it is incorrect, cross through it and enter the correct data in the appropriate fill-in area below. Also, if any of the preprinted data is absent (the area to the left of the label space lists the information that should appear), please provide it in the proper fill-in area(s) below. If the label is complete and correct, you need not complete items I, III, V, and VI (except VI-B which must be completed regardless). Complete all items if no label has been provided. Refer to the instructions for detailed item descriptions and for the legal authorizations under which this data is collected.	

INSTRUCTIONS: Complete A through J to determine whether you need to submit any permit application forms to the EPA. If you answer "yes" to any questions, you must submit this form and the supplemental form listed in the parenthesis following the question. Mark "X" in the box in the third column. If the supplemental form is attached. If you answer "no" to each question, you need not submit any of these forms. You may answer "no" if your activity is excluded from permit requirements; see Section C of the instructions. See also, Section D of the instructions for definitions of bold-faced terms.

SPECIFIC QUESTIONS	YES	NO	FORM ATTACHED	SPECIFIC QUESTIONS	YES	NO	FORM ATTACHED
A. Is this facility a publicly owned treatment works which results in a discharge to waters of the U.S.? (FORM 2A)		X		B. Does or will this facility (either existing or proposed) include a concentrated animal feeding operation or aquatic animal production facility which results in a discharge to waters of the U.S.? (FORM 2B)		X	
C. Is this a facility which currently results in discharges to waters of the U.S. other than those described in A or B above? (FORM 2C)	X			D. Is this a proposed facility (other than those described in A or B above) which will result in a discharge to waters of the U.S.? (FORM 2D)		X	
E. Does or will this facility treat, store, or dispose of hazardous wastes? (FORM 3)	X			F. Do you or will you inject at this facility industrial or municipal effluent below the (lowermost stratum containing, within one quarter mile of the well bore, underground sources of drinking water? (FORM 4)		X	
G. Do you or will you inject at this facility any produced water or other fluids which are brought to the surface in connection with conventional oil or natural gas production, inject fluids used for enhanced recovery of oil or natural gas, or inject fluids for storage of liquid hydrocarbons? (FORM 4)		X		H. Do you or will you inject at this facility fluids for special processes such as mining of sulfur by the Frasch process, solution mining of minerals, in situ combustion of fossil fuel, or recovery of geothermal energy? (FORM 4)		X	
I. Is this facility a proposed stationary source which is one of the 28 industrial categories listed in the instructions and which will potentially emit 100 tons per year of any air pollutant regulated under the Clean Air Act and may affect or be located in an attainment area? (FORM 5)		X		J. Is this facility a proposed stationary source which is NOT one of the 28 industrial categories listed in the instructions and which will potentially emit 250 tons per year of any air pollutant regulated under the Clean Air Act and may affect or be located in an attainment area? (FORM 5)		X	

III. NAME OF FACILITY

1 **BELL TELEPHONE LABORATORIES INC HO**

IV. FACILITY CONTACT

A. NAME & TITLE (last, first, & title)	B. PHONE (area code & no.)
2 MUHLER HANS GRP SUPV OPER	201 949 4850

V. FACILITY MAILING ADDRESS

A. STREET OR P.O. BOX	B. CITY OR TOWN
3 CRAWFORD CORNER ROAD	HOLMDEL
C. STATE D. ZIP CODE	
NJ 07733	

VI. FACILITY LOCATION

A. STREET, ROUTE NO. OR OTHER SPECIFIC IDENTIFIER	B. COUNTY NAME
5 CRAWFORD CORNER ROAD	MONMOUTH
C. CITY OR TOWN D. STATE E. ZIP CODE F. COUNTY CODE (if known)	
HOLMDEL NJ 07733	

Print or type in the unshaded areas only
in areas are spaced for elite type, i.e., 12 characters/line.

FORM 3510-3



ENVIRONMENTAL PROTECTION AGENCY
HAZARDOUS WASTE PERMIT APPLICATION
Consolidated Permits Program
(This information is required under Section 3005 of RCRA.)

I. EPA I.D. NUMBER
F N J D 0 1 1 3 2 8 8 8 7 3 1

FOR OFFICIAL USE ONLY

APPLICATION APPROVED	DATE RECEIVED (yr., mo., & day)	COMMENTS

II. FIRST OR REVISED APPLICATION
Place an "X" in the appropriate box in A or B below (mark one box only) to indicate whether this is the first application you are submitting for your facility or a revised application. If this is your first application and you already know your facility's EPA I.D. Number, or if this is a revised application, enter your facility's EPA I.D. Number in Item I above.

A. FIRST APPLICATION (place an "X" below and provide the appropriate date)
☒ 1. EXISTING FACILITY (See instructions for definition of "existing" facility. Complete item below.)
FOR EXISTING FACILITIES, PROVIDE THE DATE (yr., mo., & day) OPERATION BEGAN OR THE DATE CONSTRUCTION COMMENCED (use the boxes to the left)
Yr. 71 Mo. 08 Day 61

☐ 2. NEW FACILITY (Complete item below.)
FOR NEW FACILITIES, PROVIDE THE DATE (yr., mo., & day) OPERATION BEGAN OR IS EXPECTED TO BEGIN
Yr. 71 Mo. 08 Day 61

☐ 1. FACILITY HAS INTERIM STATUS

☐ 2. FACILITY HAS A RCRA PERMIT

III. PROCESSES - CODES AND DESIGN CAPACITIES

A. PROCESS CODE - Enter the code from the list of process codes below that best describes each process to be used at the facility. Ten lines are provided for entering codes. If more lines are needed, enter the code(s) in the space provided. If a process will be used that is not included in the list of codes below, then describe the process (including its design capacity) in the space provided on the form (Item III-C).

B. PROCESS DESIGN CAPACITY - For each code entered in column A enter the capacity of the process.
1. AMOUNT - Enter the amount.
2. UNIT OF MEASURE - For each amount entered in column B(1), enter the code from the list of unit measure codes below that describes the unit of measure used. Only the units of measure that are listed below should be used.

PROCESS	PROCESS CODE	APPROPRIATE UNITS OF MEASURE FOR PROCESS DESIGN CAPACITY	PROCESS	PROCESS CODE	APPROPRIATE UNITS OF MEASURE FOR PROCESS DESIGN CAPACITY
Storage:			Treatment:		
CONTAINER (barrel, drum, etc.)	S01	GALLONS OR LITERS	TANK	T01	GALLONS PER DAY OR LITERS PER DAY
TANK	S02	GALLONS OR LITERS	SURFACE IMPOUNDMENT	T02	GALLONS PER DAY OR LITERS PER DAY
WASTE PILE	S03	CUBIC YARDS OR CUBIC METERS	INCINERATOR	T03	TONS PER HOUR OR METRIC TONS PER HOUR
SURFACE IMPOUNDMENT	S04	GALLONS OR LITERS		T04	GALLONS PER DAY OR LITERS PER DAY
Spill:			OTHER (Use for physical, chemical, thermal or biological treatment processes not occurring in tanks, surface impoundments or incinerators. Describe the processes in the space provided; Item III-C.)		
INJECTION WELL	D79	GALLONS OR LITERS			
LANDFILL	D80	ACRE-Feet (the volume that would cover one acre to a depth of one foot) OR HECTARE-METER			
LAND APPLICATION	D81	ACRES OR HECTARES			
CLEAN DISPOSAL	D82	GALLONS PER DAY OR LITERS PER DAY			
SURFACE IMPOUNDMENT	D83	GALLONS OR LITERS			
UNIT OF MEASURE	UNIT OF MEASURE CODE	UNIT OF MEASURE	UNIT OF MEASURE	UNIT OF MEASURE CODE	UNIT OF MEASURE
GALLONS.....	G	LITERS PER DAY.....	V	ACRE-Feet.....	A
LITERS.....	L	TONS PER HOUR.....	D	HECTARE-METER.....	F
CUBIC YARDS.....	Y	METRIC TONS PER HOUR.....	W	ACRES.....	S
CUBIC METERS.....	C	GALLONS PER HOUR.....	E	HECTARES.....	H
GALLONS PER DAY.....	U	LITERS PER HOUR.....	H		

EXAMPLE FOR COMPLETING ITEM III (shown in line numbers X-1 and X-2 below): A facility has two storage tanks, one tank can hold 200 gallons and the other can hold 400 gallons. The facility also has an incinerator that can burn up to 20 gallons per hour.

DUP

LINE NUMBER	A. PROCESS CODE (from list above)	B. PROCESS DESIGN CAPACITY		FOR OFFICIAL USE ONLY	LINE NUMBER	A. PROCESS CODE (from list above)	B. PROCESS DESIGN CAPACITY		FOR OFFICIAL USE ONLY
		1. AMOUNT (specify)	2. UNIT OF MEASURE (enter code)				1. AMOUNT	2. UNIT OF MEASURE (enter code)	
X-1	S 0 2	600	G		5				
X-2	T 0 3	20	E		6				
	S 0 2	6000 0 0 0	G		7				
2	S 0 1	110 0 0 0	G		8				
					9				
4					10				

EPA I.D. NUMBER (enter from page 1)													FOR OFFICIAL USE ONLY									
W N J D 0 1 1 3 2 8 8 8 7 3 1													W DUP 3 2 DUP									
IV. DESCRIPTION OF HAZARDOUS WASTES (continued)																						
WASTE NO.	A. EPA HAZARD. WASTE NO. (enter code)	B. ESTIMATED ANNUAL QUANTITY OF WASTE	C. UNIT OF MEASURE (enter code)	D. PROCESSES																		
				1. PROCESS CODES (enter)												2. PROCESS DESCRIPTION (If a code is not entered in D(1))						
1	D 0 0 1	1000 000	P	S 0 2																		
2	D 0 0 2	1000 000	P	S 0 2																		
3	D 0 0 3	1000 000	P	S 0 2																		
4	F 0 0 8	100 000	P	S 0 2																		
5	F 0 0 9	3000 000	P	S 0 2																		
6	P 0 9 8	500	P	S 0 2																		
7	U 0 0 2	475	P	S 0 2																		
8	U 0 0 3	6 000	P	S 0 2																		
9	U 0 4 4	12 000	P	S 0 2																		
10	U 1 3 4	15 000	P	S 0 2																		
11	U 1 5 1	10 000	P	S 0 2																		
12	U 1 5 9	40 000	P	S 0 2																		
13	U 2 1 1	10 000	P	S 0 2																		
14	U 2 2 0	60 000	P	S 0 2																		
15	U 2 2 6	230 000	P	S 0 2																		
16	U 2 2 8	130 000	P	S 0 2																		
17	U 2 3 9	60 000	P	S 0 2																		
18																						
19																						
20																						
21																						
22																						
23																						
24																						
25																						
26																						

ATTACHMENT I

EPA I
NJDO11

X EXISTING ENVIRONMENTAL PERMITS

AGENCY	TYPE	I. D. NUMBER	DATE IS
NJDOH	SANITARY	S-12-59-1007	6-6-6
NJDOH	INDUSTRIAL	S-2-62-1007A	4-2-62
NJDOH	SANITARY	S-6-64-2227	7-17-64
NJDOH	INDUSTRIAL	S-2-67-2376	11-68
HOLMDEL TWP.	SANITARY	1394	2-28-67
NJDOH	SANITARY	S-9-71-4160	2-4-72

XI MAP

Attached is a part of the U.S. Geological Survey, Marlboro QUAP Range map showing the facility location, a survey map of the facility showing the legal boundaries and a facility drawing showing the 6000 gallon toxic wastes retention tank. There are no wells within a 1/4" mile of the facility, except three (3) wells removed from service when Monmouth Consolidated Water Co. in 1978 provided a hook up to their system.

NEW YORK 4-11-1007

FILED
EX-100
NEW YORK, N.Y. 10007

F6. ^A55 F6. ^A56

EPA I.D. NO. (enter from page 1)

J	D	0	1	1	3	2	8	8	8	7	2	6
---	---	---	---	---	---	---	---	---	---	---	---	---

V. FACILITY DRAWING

All existing facilities must include in the space provided on page 5 a scale drawing of the facility (see instructions for more detail).

VI. PHOTOGRAPHS

All existing facilities must include photographs (aerial or ground-level) that clearly delineate all existing structures; existing storage, treatment and disposal areas; and sites of future storage, treatment or disposal areas (see instructions for more detail).

VI. FACILITY GEOGRAPHIC LOCATION

LATITUDE (degrees, minutes, & seconds)										LONGITUDE (degrees, minutes, & seconds)									
4	0	2	2	1	9	C				6	7	4	1	0	4	4	C	4	0

VI. FACILITY OWNER

- ☒ A. If the facility owner is also the facility operator as listed in Section VIII on Form 1, "General Information", place an "X" in the box to the left and skip to Section IX below.
- ☐ B. If the facility owner is not the facility operator as listed in Section VIII on Form 1, complete the following items:

1. NAME OF FACILITY'S LEGAL OWNER										2. PHONE NO. (area code & no.)													
3. STREET OR P.O. BOX										4. CITY OR TOWN										5. ST.		6. ZIP CODE	
										G													

IX. OWNER CERTIFICATION

I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

A. NAME (print or type) Frank J. Lutzky, Jr. Director, Holmdel Service Operations	B. SIGNATURE 	C. DATE SIGNED 11/14/84
---	------------------	----------------------------

X. OPERATOR CERTIFICATION

I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

A. NAME (print or type)	B. SIGNATURE	C. DATE SIGNED

REFERENCE NO. 3

RCRA GENERATOR INSPECTION FORM

COMPANY NAME: *Bell Telephone Laboratories* ^{HO} EPA I.D. NUMBER:

COMPANY ADDRESS: *Crawford Corner Road*
Holmdel NJ *NJ D011328887*

COMPANY CONTACT OR OFFICIAL:

Hans Muller

INSPECTOR'S NAME:

Tom Denny

TITLE: *Supervising Engineer*
5296

BRANCH/ORGANIZATION:

NJ D011328887

CHECK IF FACILITY IS ALSO A TSD
FACILITY ☒

DATE OF INSPECTION:

9/4/81

YES

NO

DON'T
KNOW

(1) Is there reason to believe that the facility has hazardous waste on site?

☒

—

—

a. If yes, what leads you to believe it is hazardous waste?
Check appropriate box:

☒ Company admits that its waste is hazardous during the inspection.

☒ Company admitted the waste is hazardous in its RCRA notification and/or Part A Permit Application.

☐ The waste material is listed in the regulations as a hazardous waste from a nonspecific source (§261.31)

☐ The waste material is listed in the regulations as a hazardous waste from a specific source (§261.32)

☐ The material or product is listed in the regulations as a discarded commercial chemical product (§261.33)

☐ EPA testing has shown characteristics of ignitability, corrosivity, reactivity or extraction procedure toxicity, or has revealed hazardous constituents (please attach analysis report)

☐ Company is unsure but there is reason to believe that waste materials are hazardous. (Explain)

YES	NO	DON'T KNOW
-----	----	---------------

- b. Is there reason to believe that there are hazardous wastes on-site which the company claims are merely products or raw materials?

—	X	—
---	---	---

Please explain:

- c. Identify the hazardous wastes that are on-site, and estimate approximate quantities of each.

*Various lab chemicals
6000 gal/yr*

- d. Describe the activities that result in the generation of hazardous waste.

Research & Dev. Lab

- (2) Is hazardous waste stored on site?

X	—	—
---	---	---

- a. What is the longest period that it has been accumulated?

1 yr.

- b. Is the date when drums were placed in storage marked on each drum?

—	X	—
---	---	---

- (3) Has hazardous waste been shipped from this facility since November 19, 1980?

X	—	—
---	---	---

- a. If "yes," approximately how many shipments were made?

2

- (4) Approximately how many hazardous waste shipments off site have been made since November 19, 1980?

2

- a. Does it appear from the available information that there is a manifest copy available for each hazardous waste shipment that has been made?

X	—	—
---	---	---

- b. If "no" or "don't know," please elaborate.

	<u>YES</u>	<u>NO</u>	<u>DON'T KNOW</u>
c. Does each manifest (or a representative sample) have the following information?			
- a manifest document number	<u>X</u>	—	—
- the generator's name, mailing address, telephone number, and EPA identification number	<u>X</u>	—	—
- the name, and EPA identification number of each transporter	<u>X</u>	—	—
- the name, address and EPA identification number of the designated facility and an alternate facility, if any:	<u>X</u>	—	—
- a description of the wastes (DOT)	<u>X</u>	—	—
- the total quantity of each hazardous waste by units of weight or volume, and the type and number of containers as loaded into or onto the transport vehicle	<u>X</u>	—	—
- a certification that the materials are properly classified, described, packaged, marked, and labeled, and are in proper condition for transportation under regulations of the Department of Transportation and the EPA	<u>X</u>	—	—
(5) Were there any hazardous wastes stored on site at the time of the inspection?	<u>X</u>	—	—
a. If "yes," do they appear properly packaged (if in containers) or, <u>if in tanks</u> , are the tanks secure?	—	—	—
b. If not properly packaged or in secure tanks, please explain.			
c. Are containers clearly marked and labelled? <i>5, 60 gal drums of plating bath solution</i>	—	<u>X</u>	—
d. Do any containers appear to be leaking? <i>200.00</i>	—	<u>X</u>	—
e. If "yes," approximately how many?			

5, 60 gal drums of plating bath solution

NA
*(6) Has the generator submitted an annual report to EPA covering the previous calendar year? — — —

a. How do you know? — — —

(7) Has the generator received signed copies (from the TSD facility) of all manifests for wastes shipped off site more than 35 days ago? — — —

a. If "no," have Exception Reports been submitted to EPA covering these shipments? — — —

(8) General comments.

* The effective date for this requirement is March 1, 1982.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

RCRA TRANSPORTER INSPECTION CHECKLIST

Transporter Name: Bell Telephone Laboratories EPA I.D.: NJ D011328887
Transporter Address: Crawford Corner Road Driver: _____
Holmdel

- | | <u>Yes</u> | <u>No</u> |
|--|------------|-----------|
| 1. Does the transporter have an EPA I.D. number? | (X) | () |
| 2. Is the transporter carrying hazardous waste? | () | () |
| 3. Does the transporter have a manifest? <i>See #7</i> | () | () |
| 4. Does the manifest show the following information: | | |
| a. Name, address, I.D. of generator | () | () |
| b. Name, address, I.D. of transporter | () | () |
| c. Name, address, I.D. of designated facility | () | () |
| d. Name of alternative facility | () | () |
| e. DOT waste description | () | () |
| f. Quantity of waste-volume, weight,
number of containers | () | () |
| g. Signed certification statement | () | () |
| 5. Does the manifest information confirm vehicle load? | () | () |
| 6. Is the vehicle placarded for hazardous waste? | () | () |
| 7. General comments: | | |

Facility is registered as a transporter but as of this time
does not transport any hazardous waste.

Inspected by: Shirley Denny
Date: 2/4/81

RCRA TREATMENT, STORAGE AND DISPOSAL FACILITY INSPECTION FORM
FOR TSD FACILITIES ONLY

COMPANY NAME: Bell Telephone

HO
EPA I.D. Number:

COMPANY ADDRESS:

Crawford Corner Road
COMPANY CONTACT OR OFFICIAL:

NIS 001132887

OTHER ENVIRONMENTAL PERMITS HELD

BY FACILITY: ☒ NPDES

TITLE:

☐ AIR

☐ OTHER

INSPECTOR'S NAME:

DATE OF INSPECTION:

9/4/81

BRANCH/ORGANIZATION:

TIME OF DAY INSPECTION TOOK PLACE:

(1) Is there reason to believe that the facility has hazardous waste on site?

a. If yes, what leads you to believe it is hazardous waste?
Check appropriate box:

☒ Company admits that its waste is hazardous during the inspection.

☒ Company admitted the waste is hazardous in its RCRA notification and/or Part A Permit Application.

☐ The waste material is listed in the regulations as a hazardous waste from a nonspecific source (§261.31)

☐ The waste material is listed in the regulations as a hazardous waste from a specific source (§261.32)

☐ The material or product is listed in the regulations as a discarded commercial chemical product (§261.33)

☐ EPA testing has shown characteristics of ignitability, corrosivity, reactivity or extraction procedure toxicity, or has revealed hazardous constituents (please attach analysis report)

☐ Company is unsure but there is reason to believe that waste materials are hazardous. (Explain)

YES

NO

DON'T
KNOW

b. Is there reason to believe that there are hazardous wastes on-site which the company claims are merely products or raw materials?

YES NO DON'T
KNOW X

- ☒ Company admits that its waste is hazardous during the inspection.
- ☒ Company admitted the waste is hazardous in its RCRA notification and/or Part A Permit Application.
- ☐ The waste material is listed in the regulations as a hazardous waste from a nonspecific source (§261.31)
- ☐ The waste material is listed in the regulations as a hazardous waste from a specific source (§261.32)
- ☐ The material or product is listed in the regulations as a discarded commercial chemical product (§261.33)
- ☐ EPA testing has shown characteristics of ignitability, corrosivity, reactivity or extraction procedure toxicity, or has revealed hazardous constituents (please attach analysis report)
- ☐ Company is unsure but there is reason to believe that waste materials are hazardous. (Explain)

YES NO DON'T
KNOW

- b. Is there reason to believe that there are hazardous wastes on-site which the company claims are merely products or raw materials?

— X —

Please explain:

- c. Identify the hazardous wastes that are on-site, and estimate approximate quantities of each.

*Various Lab wastes - 2000 gallon tank
5, 60 gallon drums of plating bath solution*

- (2) Does the facility generate hazardous waste?
- (3) Does the facility transport hazardous waste?
- (4) Does the facility treat store or dispose of hazardous waste?

X — —

*I do register a transporter
But do not transport*

X — —

VISUAL OBSERVATIONS

- | | <u>YES</u> | <u>NO</u> | <u>DON'T
KNOW</u> |
|---|------------|-----------|-----------------------|
| (5) <u>SITE SECURITY</u> (§265.14) | | | |
| a. Is there a 24-hour surveillance system? | <u>X</u> | — | — |
| b. Is there a suitable barrier which completely surrounds the active portion of the facility? | <u>X</u> | — | — |
| c. Are there "Danger-Unauthorized Personnel Keep Out" signs posted at each entrance to the facility? | <u>X</u> | — | — |
| (6) Are there <u>ignitable</u> , reactive or incompatible wastes on site? (§265.27) | <u>X</u> | — | — |
| a. If "YES", what are the approximate quantities? | | | |
| b. If "YES", have precautions been taken to prevent accidental ignition or reaction of ignitable or reactive waste? | <u>X</u> | — | — |
| c. If "YES", explain | | | |
| d. In your opinion, are proper precautions taken so that these wastes do not: | | | |
| - generate extreme heat or pressure, fire or explosion, or violent reaction? | <u>X</u> | — | — |
| - produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health? | <u>X</u> | — | — |
| - produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosions? | <u>X</u> | — | — |
| - damage the structural integrity of the device or facility containing the waste? | <u>X</u> | — | — |
| - threaten human health or the environment? | <u>X</u> | — | — |

Please explain your answers, and comment if necessary.

- e. Are there any additional precautions which you would recommend to improve hazardous waste handling procedures at the facility?

SITE-SPECIFIC

Please circle all appropriate activities and answer questions on indicated pages for all activities circled. When you submit your report, include only those site-specific pages that you have used.

STORAGETREATMENTDISPOSAL

Waste Pile p. 9

Tank p. 8

Landfill pp. 10-11

Surface Impoundment p. 8

Surface Impoundment pp. 8-9

Land Treatment
pp. 9, 10

Container p. 7

Incineration pp. 12-13

Surface Impound-
ment p. 8

Tank, above ground p. 8

Thermal Treatment pp. 12-13

Other _____

Tank, below ground p. 8

Land Treatment pp. 9-10

Other _____

Chemical, Physical p. 13
and Biological
Treatment (other than
in tanks, surface impound-
ment or land treatment
facilities)YESNODON'T
KNOW

Other _____

CONTAINERS (\$265.170)

1. Are there any leaking containers?
If "YES", explain.

— X —

2. Are there any containers which appear in danger
of leaking?
If "YES", explain.

— X —

3. Do wastes appear compatible with container
materials?

X — —

4. Are all containers closed except those in use?

X — —

5. Do containers appear to be opened, handled
or stored in a manner which may rupture the
containers or cause them to leak?

— X —

6. How often does the plant manager claim to inspect
container storage areas? 4-5 times a day

<u>TANKS (\$265.190)</u>		<u>YES</u>	<u>NO</u>	<u>DON'T KNOW</u>
1.	Are there any leaking tanks? If "YES", explain.	—	<u>X</u>	—
2.	Are there any tanks which appear in danger of leaking. If "YES", explain.	—	<u>X</u>	—
3.	Are wastes or treatment reagents being placed in tanks which could cause them to rupture, leak, corrode or otherwise fail? If "YES", explain. <i>Epoxy lined tank</i>	—	<u>X</u>	—
4.	Do uncovered tanks have at least 2 feet of freeboard or an adequate containment structure?	<u>✓</u>	—	—
5.	Where hazardous waste is continuously fed into a tank, is the tank equipped with a means to stop this inflow? <i>NA</i>	—	—	—
6.	Does it appear that incompatible wastes are being stored in close proximity to one another, or in the same tank? If "YES", explain.	—	<u>X</u>	—
7.	How often does the plant manager claim to inspect container storage areas?			
8.	<i>4-5 times a day</i> Are ignitable or reactive wastes stored in a manner which protects them from a source of ignition or reaction? If "YES", explain.	<u>X</u>	—	—
9.	What is the approximate number and size of tanks containing hazardous wastes? <i>1, 6000 tank</i>			

SURFACE IMPOUNDMENTS (\$265.220)

1. Is there at least 2 feet of freeboard
in the impoundment?
2. Do all earthen dikes have a protective

REFERENCE NO. 4

LAS

CLOS

LATITUDE: 402219.0

OPERATOR ADI

BELL TELEPHONE
CRAWFORD CORNER
HOLMDEL
201/949-4

PERMITS

TYPE	NUMBER
Y	20298
N	NJ0000477
S	S262100TA
S	S12591007

TRANSPORTATION

ROAD

[illegible]

NJ 07733

CLOSURE DATE:

025 DISTRICT: BASIN: LATITUDE: 402219.0 LONGITUDE: 0741044.0

T: COMMERCIAL: NON-REGULATED: OWNER TYPE: P FACILITY TYPE: GEN TRANS TSDP

OPERATOR ADDRESS
BELL TELEPHONE LABORATORIES INC
CRAWFORD CORNER ROAD
NJ 07733 HOLMDEL NJ 07733
201/949-4850

NOTIFICATION DATA

PERMIT STATUS: 1
NOTIFICATION RECEIVED: 8/18/80
NOTIFICATION ACKNOWLEDGED: 10/09/80
PART A RECEIVED: 11/19/80
(1) PART A ACKNOWLEDGED: 1/15/81
(2) PART A ACKNOWLEDGED:

PERMITS

TYPE	NUMBER
Y	20298
N	NJ0000477
S	S262100TA
S	S12591007

DESIGN CAPACITY

PROCESS	AMOUNT	UNIT
S02	6000	6000.000 G
S01	575	110.000 G

notes change in Bureau's letter
June 28, 1954

TRANSPORTATION

ROAD

WASTE DESCRIPTION

[illegible]

REFERENCE NO. 5



AUG 5 1983

State of New Jersey

DEPARTMENT OF ENVIRONMENTAL PROTECTION

DIVISION OF WASTE MANAGEMENT
32 E. Hanover St., CN 028, Trenton, N.J. 08625

JACK STANTON
DIRECTOR

August 3, 1983

LINO F. PEREIRA
DEPUTY DIRECTOR

Paul E. Wyszkowski, P.E.
Bell Laboratories
600 Mountain Avenue
Murray Hill, NJ 07974

RE: Meeting Held on July 29, 1983

Dear Mr. Wyszkowski:

This letter will serve to confirm the conclusions arrived at during our July 29, 1983 meeting. The meeting was held to discuss what Bell could do to eliminate registering their numerous satellite facilities as generators and TSD's. It was found that most of these facilities would be able to be classified as small quantity generators, therefore they would not have to register as generators or facilities. Please keep in mind, this only holds true for those facilities that would have less than 100 kg of hazardous waste (1 kg of acutely toxic) on-site at anytime. Once the facility goes over this limit they would have ninety (90) days to remove the waste and become registered as a generator or have to become registered as a TSD facility.

In order to avoid exceeding the 100 kg limit you proposed to ship these small quantities to Bell's interim status TSD facilities for consolidation. You were advised that to be permitted to do this these facilities would need to have interim status for S01, drum storage, since off-site containerized material would be accepted at these sites.

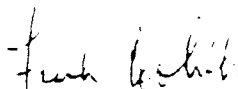
Currently, only the Holmdel facility has the required S01 status. Therefore, in order to accept the small quantities at the Murray Hill and Whippany facilities revised Part A application, indicating the desired S01 status, must be submitted to the Bureau of Hazardous Waste Engineering for approval. Also, all three facilities' Part A's should be revised to reflect the acceptance of off-site small quantities.

In regard to the transportation of the small quantities to the previously mentioned facilities you were advised that it was not necessary to manifest these shipments; nor was it necessary to use a permitted hazardous waste hauler. However, you are required to use a permitted solid waste hauler and it was suggested that you might register one of Bell's trucks to serve this purpose.

August 3, 1983

If I have misinterpreted any of our conclusions at the meeting, please advise me immediately at (609) 292-9880.

Very truly yours,



Frank Coolick, Chief
Bureau of Hazardous Waste Engineering

FC:EK:ch

REFERENCE NO. 6

ENTRANCE

NJDEP INSPECTION FORM

Report Prepared for:

Generator ☒

Transporter ☒

HWM (TSD) facility ☒

Facility Information

Name: Bell LABS

Address: Crawford Corner Rd.

HOLMDEL 07733

Lot: _____ Block: _____

County: Monmouth

Phone: 201 - 949-4850

EPA ID#: NJDO11328887

Date of Inspection: 11/21/83

Participating Personnel

State or EPA personnel: Kevin F. Gashlin

Sr. Env. Spec.

Facility personnel: H. Muhler - Sup. - Op. + Mt.

David Cesareo - Env. Mgmt.

George Bogdan - P.E.

Report Prepared by Name: K. Gashlin

Region: CFO

Telephone #: 609-292-4592

Reviewed by: Kevin F. Gashlin

Date of Review: 11/21/83

FACILITY NAME: Bells Lax

ADDRESS: Crawford Corner Rd

Holmdel

TIME IN: 0900

COUNTY: Monmouth

TIME OUT: _____

EPA ID #: NJ0011328887

DATE OF INSPECTION: 11/17/83

PHOTOS TAKEN ☐ YES ☒ NO

If yes, how many? _____

SAMPLES TAKEN ☐ YES ☒ NO NUMBER OF SAMPLES _____

ADDER ID # _____

MANIFESTS REVIEWED ☒ YES ☐ NO

Number of manifests in compliance 16

Number of manifests not in compliance 1

List manifest document numbers of those manifests not in compliance.

NJ 0135084 - NO TRANS. date rec'd

Shift Sup. 949-2191

Summary of Findings

Facility Description and Operations

High-Tech telecommunications industry research
and development installation. Defense work and
consumer work primary.

Describe the activities that result in the generation of hazardous waste.

Etching circuit boards, reagent use in labs.

Identify the hazardous waste located on site, and estimate the approximate quantities of each. (Identify Waste Codes)

Waste oil (non-PCO) - two drums

" corrosives - 10 drums

lab paks - various quantities + types approx 100 bottles.

5000 gallons toxic wst. is in wst + K.

GENERATOR INSPECTION CHECKLIST

		YES	NO	N/A
7:26-8.5	<u>Hazardous waste determination</u>			
	(a) Did the generator <u>test its waste</u> to determine whether it is hazardous?	<u>X</u>	—	—
	Is the waste hazardous?	<u>X</u>	—	—
	Is the generator determining that its waste exhibits a hazardous waste characteristic(s) based on its <u>knowledge of the material(s)</u> or processes used?	<u>X</u>	—	—
	Has hazardous waste been shipped off site since November 19, 1980?	<u>X</u>	—	—
	If yes, <u>how many shipments</u> , off site, have been made and describe the approximate size of an average shipment made on a monthly basis. If facility is a small quantity generator, please explain.			
				<i>18 since beginning of 1983. Other manifests</i>
7:26-7.4(a)1	Does the generator have an <u>EPA ID #</u> ?	<u>X</u>	—	—
7:26-7.4(a)4	Does each manifest have the following information? Please circle the elements missing and obtain a copy of the incomplete manifests. (List those manifests that are deficient)		—	—
7:26-7.4(a)4i	The generator's name, address and phone number?		—	—
7:26-7.4(a)4ii	The generator's EPA ID number?		—	—
7:26-7.4(a)4iii	The transporter(s) name, address and phone number?		—	—
7:26-7.4(a)4iv	The transporter(s) EPA ID number?		—	—
7:26-7.4(a)4v	The name, address and phone number of the designated TSD facility?		—	—
7:26-7.4(a)4vi	The TSDF's EPA ID number?		—	—
7:26-7.4(a)4vii	The name, type and quantity of hazardous waste being shipped, including such particulars as may be required regarding same?		—	—

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-7.4(a)4viii	Special handling instructions and any other information required on the form to be shipped by the generator?	<u>X</u>	<u> </u>	<u> </u>
7:26-7.4(a)5	Before allowing the manifested waste to leave the generator's property, did the generator:			
7:26-7.4(a)5i	Sign the manifest certification by hand?	<u> </u>	<u> </u>	<u> </u>
7:26-7.4(a)5ii	Obtain the handwritten signature of the initial transporter and date of acceptance on the manifest?	<u> </u>	<u> </u>	<u> </u>
7:26-7.4(a)5iii	Retain one copy and forward one copy to the state of origin and one copy to the state of destination?	<u> </u>	<u> </u>	<u> </u>
7:26-7.4(a)5iv	Give remaining copies of the manifest form to the transporter?	<u> </u>	<u> </u>	<u> </u>
7:26-7.4(f)1	Has the generator maintained facility records since November 19, 1980? (Manifest(s), exception report(s) and waste analysis)	<u> </u>	<u> </u>	<u> </u>
7:26-7.4(h)1	Has the generator received signed copies of portion B (from the TSD facility) of all manifests for waste shipped off site more than 35 days ago?	<u> </u>	<u> </u>	<u> </u>
7:26-7.4(h)2	If not,			
	1. Did the generator contact the hauler and/or the owner or operator of the TSDF and the NJDEP at 609-292-9877 to inform the NJDEP of the situation, and	<u> </u>	<u> </u>	<u> </u>
	2. Have exception reports been submitted to the Department covering any of these shipments made more than 45 days ago?	<u> </u>	<u> </u>	<u> </u>
	Before transporting or offering hazardous waste for transportation off site, does the generator?			
7:26-7.2(a)	Conspicuously label appropriate manifest numbers on all hazardous waste containers that are intended for shipment?	<u> </u>	<u> </u>	<u> </u>
7:26-7.2(b)	Insure that all containers used to transport hazardous waste off site are in conformance with applicable DOT regulations (i.e., 49 CFR 171 - 49 CFR 179)?	<u> </u>	<u> </u>	<u> </u>

YES NO N/A

7:26-9.3

Accumulation time

How is waste accumulated on site?

- ☒ Containers
- ☒ Tanks (complete HWMF checklist)
- ☐ Aboveground ☒ Below ground
- ☐ Surface impoundments (complete HWMF checklist)
- ☐ Piles (complete HWMF checklist)

7:26-9.3(a)3

Is each container clearly dated with each period of accumulation so as to be visible for inspection?

— — X

Is waste accumulated for more than 90 days?

X — —

If yes, complete HWMF checklist.

STOP HERE IF THE HAZARDOUS WASTE MANAGEMENT FACILITY (TSD) CHECKLIST IS FILLED OUT.

SHORT TERM ACCUMULATION STANDARDS (FOR GENERATORS WHO ACCUMULATE WASTE IN CONTAINERS FOR 90 DAYS OR LESS)

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4	<u>Containers</u> What type of containers are used for storage. Describe the size, type and quantity and nature of waste (e.g., 12 fifty five gallon drums of waste acetone).			
7:26-9.4(d)3	Do the containers appear to be in good condition, not in danger of leaking? If no, please describe the type, condition and number of leaking or corroded containers. Be detailed and specific.	_____	_____	_____
7:26-9.4(d)4i	Are all containers securely closed except those in use?	_____	_____	_____
7:26-9.4(d)4iii	Do containers appear to be properly handled or stored in a manner which will minimize the risk of the container rupturing or leaking?	_____	_____	_____
7:26-9.4(d)4iv	Are containerized hazardous waste segregated in storage by waste type?	_____	_____	_____
7:26-9.4(d)4v	Is every container arranged so that its identification label is visible?	_____	_____	_____
7:26-9.4(d)5	Is the storage area inspected at least daily?	_____	_____	_____
7:26-9.4(d)6	Are containers holding ignitable and reactive wastes located at least 50 feet (15 meters) from the facility's property line?	_____	_____	_____
7:26-11.2	<u>Tanks</u> What are the approximate number and size of tanks containing hazardous waste? Identify the waste treated/stored in each tank.	_____	_____	_____

YES NO NA

General Operating Requirements

7:26-11.2(a)2 Are the tanks maintained so that there is no evidence of past, present, or risk of future leaks?

If no, please explain.

Are there leaking tanks?

7:26-11.2(a)2 Are all hazardous wastes or treatment reagents being placed in tanks compatible with the tank material so that there is no danger of ruptures, corrosion, leaks or other failures?

7:26-11.2(3) Do uncovered tanks have at least 2 feet of freeboard or an adequate containment structure?

7:26-11.2(a)4 If waste is continuously fed into a tank, is the tank equipped with a means to stop the inflow from the tank, e.g., bypass system to a standby tank?

7:26-11.2(c) Inspections

Is the tank(s) inspected each operating day for:

1. Discharge control equipment
2. Monitoring equipment
3. Level of waste in tank
4. Construction of materials of the tank
5. Are the tanks and surrounding areas (e.g., dike) inspected weekly for leaks, corrosion or other failures?

Are there underground tanks?

If yes, how many and can they be entered for inspection?

7:26-11.2(e) Are ignitable or reactive wastes stored in a manner which protects them from a source of ignition or reaction?

If no, please explain.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.2(f)	Does it appear that incompatible wastes are being stored separate from each other?	___	___	___
7:26-9.4(g)	<u>Personnel training</u>			
	Have facility personnel successfully completed a program of classroom instruction or on-the-job training within 6 months of having been employed?	___	___	___
7:26-9.4(g)2	Is the program directed by a person trained in hazardous waste management procedures and does it include instruction which teaches facility personnel hazardous waste management procedures (including contingency plan implementation) relevant to the positions in which they are employed?	___	___	___
7:26-9.4(g)5	If yes, have facility personnel taken part in an annual review of training?	___	___	___
	Is there written documentation of the following:	___	___	___
7:26-9.4(g)6i	Job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job?	___	___	___
7:26-9.4(g)6ii	A written job description for each position related to hazardous waste management?	___	___	___
7:26-9.4(g)6iii	A written description of the type and amount of both introductory and continuing training given to personnel in jobs related to hazardous waste management?	___	___	___
7:26-9.4(g)6iv	Documentation of actual training or experience received by personnel?	___	___	___
7:26-9.4(g)7	Are training records kept on all employees for at least 3 years?	___	___	___
7:26-9.4(g)8	Are semi-annual drills conducted involving all employees and appropriate local authorities to test emergency response capabilities at the facility in accordance with the contingency plan and emergency procedures development pursuant to NJAC 7:26-9.7?	___	___	___
7:26-9.6	<u>Preparedness and prevention</u>			
	Does the facility comply with preparedness and prevention requirements including maintaining:			

		YES	NO	N/A
7:26-9.6(b)1	An internal communications or alarm system?	___	___	___
7:26-9.6(b)2	A telephone or other device to summon emergency assistance from local authorities?	___	___	___
7:26-9.6(b)3	Portable fire equipment, spill control equipment, and decontamination equipment?	___	___	___
7:26-9.6(b)4	Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems?	___	___	___
7:26-9.6(c)	Is equipment tested and maintained?	___	___	___
7:26-9.6(d)1	Is there immediate access to communications or alarm systems during handling of hazardous waste?	___	___	___
7:26-9.6(e)	Adequate aisle space to allow unobstructed movement of personnel fire protection equipment, spill control equipment and decontamination equipment?	___	___	___
	If no, please explain.			
	In your opinion, do the types of waste on site require all of the above procedures, or are some not required?	___	___	___
	Explain.			
7:26-9.6(f)	Has the facility made the following arrangements, as appropriate for the type of waste handled on site:	___	___	___
7:26-9.6(f)1	Familiarize police, fire departments and emergency response teams with the layout of the facility and hazardous waste handled?	___	___	___
7:26-9.6(f)2	Where more than one police and fire department might respond to an emergency, is there an agreement designating primary emergency authority to a specific police or fire department, and agreements with any others to provide support to the primary emergency authority?	___	___	___

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.6(f)3	Agreements with emergency response contractors, and equipment suppliers?	—	—	—
7:26-9.6(f)4	Arrangements to familiarize local hospitals with the properties of hazardous waste handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or discharges at the facility?	—	—	—
7:26-9.6(f)5	Arrangements with local fire departments to inspect the facility on a regular basis with at least two (2) inspections annually?	—	—	—
7:26-9.7	<u>Contingency plan and emergency procedures</u>			
7:26-9.7(a)	Does the facility have a written contingency plan for emergency procedures designed to deal with fires, explosions, hazards to human health or environment, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil or surface water?	—	—	—
7:26-9.7(b)	Are provisions of the plan carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment?	—	—	—
7:26-9.7(c)	Does the contingency plan describe the actions facility personnel shall take in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility?	—	—	—
7:26-9.7(d)	Did the owner or operator prepare a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112 or 151 or a Discharge Prevention, Containment and Countermeasure (DPCC) Plan in accordance with N.J.A.C. 7:1E-4.1 <u>et seq.</u> ?	—	—	—
	If yes, did the owner or operator amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of this section?	—	—	—
7:26-9.7(e)	Does the plan describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and State and local emergency response teams to coordinate emergency services?	—	—	—

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.7(f)	Does the plan list names, addresses, and phone numbers (office and home) of all persons qualified to act as emergency coordinator and is this list kept up to date? Where more than one person is listed, one shall be named as primary emergency coordinator and others shall be listed in the order in which they will assume responsibility as alternates.	—	—	—
7:26-9.7(g)	Does the plan include a list of all emergency equipment at the facility (such as fire extinguishing systems, spill control equipment, communications and alarm systems (internal and external), and decontamination equipment), where this equipment is required? Is the list kept up-to-date? In addition, does the plan include the location and a physical description of each item on the list, and a brief outline of its capabilities?	—	—	—
7:26-9.7(h)	Does the plan include an evacuation procedure for facility personnel where there is a possibility that evacuation could be necessary? Does this plan describe signal(s) to be used to begin evacuation, evacuation routes, and alternative evacuation routes (in cases where the primary routes could be blocked by releases of hazardous waste or fires)?	—	—	—
7:26-9.7(i)	Is a copy of the contingency plan and all revisions to the plan: 1. Maintained at the facility; and 2. Has the contingency plan been submitted to local authorities (police fire departments, emergency response teams)?	—	—	—

TRANSPORTER INSPECTION

YES NO N/A

Does the transporter carry hazardous waste?
If yes, explain.

TRANSPORTER LICENSE HAS NOT BEEN USED NOR IS THERE
ANY INTENT TO USE IN FUTURE.

7:26-7.5(c)1 Has the transporter obtained a hazardous waste
collector/hauler license from the NJDEP?
License #: _____

7:26-7.5(d)1 Does the transporter have an EPA identifica-
tion number? _____

7:26-3.4(h) Do the vehicle(s) have the NJSWA registration
number in letters and numbers at least three 3
inches in height? _____

7:26-3.4(h) Is the capacity of the vehicle marked on both
sides of the vehicle in letters and numbers
at least three 3 inches in height? _____

7:26-3.4(h) Is the current NJSWA registration certificate
in the vehicle? _____

7:26-3.5 b Does the license plate number and registration
number on the certificate correspond to the
vehicle's license plate number and the regis-
tration number displayed on the vehicle? _____

7:26-7.5(d) Does the transporter have in each registered
vehicle a current list of all federal and
state agencies to be notified in the event
of a discharge of hazardous waste during
transportation? _____

How many vehicles were inspected? _____

7:26-7.5(d)12 Have the drivers received any instruction
or training to do with the handling of
hazardous waste? _____

7:26-7.5(d)15 Is the transporter equipped with emergency
equipment in conformance with subpart H of
49 CFR 393? _____

YES NO N/A

Has the transporter ever had an unauthorized discharge of hazardous waste during transportation?

If yes, did the transporter:

7:26-7.5(f)3i Give notice, if required by 49 CFR 171.15 to the National Response Center?

7:26-7.5(f)3ii Report in writing as required by 49 CFR 171.16 to the Director, Office of Hazardous Materials, Transportation Bureau, Department of Transportation, Washington, DC 20590?

7:26-7.5(f)3iii Contact the Department at 609-292-5560 or 609-292-7172?

MANIFESTS

7:26-7.5(c)5 Does the transporter have a manifest form to accompany the waste shipment?

Manifest document number: _____

7:26-7.3(a)1 If the shipment originated from a site in New Jersey and is destined for another site in New Jersey, is the manifest form one supplied by the NJDEP?

7:26-7.3(a)2 If the shipment originated from a site in another state and is destined for a TSDF in New Jersey, is the manifest form one supplied by the NJDEP or one approved for use in New Jersey by the Department?

7:26-7.3(a)3 If the shipment originated from a site in New Jersey and is destined for a TSDF in another state, is the manifest form one supplied by the NJDEP or one approved for use by the Department?

7:26-7.3(a)4 If the hauler was unable to deliver a manifested load to the designated facility, did they contact the generator and gain further instructions from them?

If yes, cite generator name and manifest number involved.

HAZARDOUS WASTE FACILITY STANDARDS

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(b)	<u>Waste Analysis</u>			
7:26-9.4(b)1i	Is there a detailed chemical and physical analysis of a <u>representative sample of the waste(s) or each waste?</u> (At a minimum, this analysis must contain all the information necessary for proper treatment, storage or disposal of the waste.)	<u>X</u>	—	—
7:26-9.4(b)1iii	Does the <u>character</u> of the waste handled at the facility <u>change</u> from day to day, week to week, etc., thus requiring frequent testing? Check only one: Waste characteristics vary All waste(s) are basically the same <u>X</u> Company treats all waste(s) as hazardous <u>—</u>	—	<u>X</u>	—
7:26-9.4(b)2	Is there a <u>written waste analysis plan</u> at the facility? Does it contain:	<u>X</u>	—	—
7:26-9.4(2)i	<u>Parameters</u> for which each hazardous waste stream will be analyzed including constituents listed in NJAC 7:26-8.16 and the <u>rational</u> for the selection of these parameters?	<u>X</u>	—	—
7:26-9.4(b)2ii	The <u>test methods</u> which will be used to test for these parameters?	<u>X</u>	—	—
7:26-9.4(b)2iii	The <u>sampling method</u> which will be used to obtain a representative sample of the waste to be analyzed?	<u>X</u>	—	—
7:26-9.4(b)2iv	The <u>frequency</u> with which the initial analysis of the waste will be reviewed or repeated to ensure that the analysis is accurate and up-to-date?	<u>X</u>	—	—
7:26-9.4(b)2v	For off-site facilities, the waste analysis that hazardous waste generators have agreed to supply?	—	—	<u>X</u>
7:26-9.4(b)2vi	Procedures which will be used to identify changes in waste stream characteristics?	<u>X</u>	—	—
7:26-9.4(b)3	Did the <u>owner or operator submit the waste analysis plan to the Department?</u> If yes, when was the plan submitted?	—	—	—

Does hazardous waste come to this facility from an outside source? (e.g., another generator)

YES NO N/A

— X —

If yes, list the name(s) of generators.

N/A

7:26-9.4(b)4

If waste comes from an outside source, are there procedures in the waste analysis plan to insure that waste received conforms to the accompanying manifest?

— — X

Does the plan describe:

7:26-9.4(b)4i

The procedures which will be used to determine the identity of each shipment of waste managed at the facility?

— — X

7:26-9.4(b)4ii

The sampling method which will be used to obtain a representative sample of the waste to be identified, if the identification method includes sampling?

— — X

7:26-9.4(h)

Security

Does the facility have:

7:26-9.4(h)1i

A 24 hour surveillance system which continuously monitors and controls entry onto the active portion of the facility?

X —

7:26-9.4(h)1ii

An artificial or natural barrier, which completely surrounds the active portion of the facility; and a means to control entry, at all times, through the gates or other entrances to the active portion of the facility?

X —

7:26-9.4(h)3

Are there "Danger - Unauthorized Personnel Keep Out" signs posted at each entrance to the facility?

X —

If no, explain what measures are taken for security.

		YES	NO	N/A
7:26-9.4(f)	<u>General Inspection Requirements</u>			
7:26-9.4(f)1	Does the owner or operator <u>inspect the facility for malfunctions and deterioration, operator errors and discharges which may be causing, or may lead to:</u>			
7:26-9.4(f)1i	Discharge of hazardous waste constituents to the environment?	X		
7:26-9.4(f)1ii	A threat to human health?	X		
7:26-9.4(f)3	Has the owner or operator developed, and does the owner or operator <u>follow a written schedule for inspecting monitoring equipment, safety and emergency equipment, security devices, and operating and structural equipment that are utilized for the prevention, detection or response to environmental or human health?</u>	X		
7:26-9.4(f)3i	Did the owner or operator submit the <u>written inspection schedule to the department?</u> If yes, when was it submitted?			
7:26-9.4(f)3iii	<u>Is the written inspection schedule kept at the facility?</u>	X		
7:26-9.4(f)3iv	Does the schedule identify the types of problems to be looked for during the inspection?	X		
7:26-9.4(f)3v	Does the schedule include the <u>frequency of inspection</u> , based upon the rate of possible deterioration of the equipment and the probability of an environmental, or human health incident if the deterioration or malfunctions or any operator error goes undetected between inspections?	X		
7:26-9.4(f)5	Is there evidence that problems reported in the inspection log have been remedied?	<u>undetermined no problems noted.</u>		
7:26-9.4(f)6	Does the owner/operator record inspections in a log?	X		
	Are these records kept for at least three (3) years from the date of inspection?	X		

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
	Does the records include the date, and time of the inspection, the name of the inspector, a notation of the observations made, and the date and nature of any repairs or other remedial action?	<u>X</u>	—	—
7:26-9.4(g)	<u>Personnel training</u>			
	Have <u>facility personnel</u> successfully completed a program of <u>classroom instruction or on-the-job training</u> within 6 months of having been employed?	<u>X</u>	—	—
7:26-9.4(g)2	Is the program directed by a person trained in hazardous waste management procedures and does it include instruction which teaches facility personnel hazardous waste management procedures (including contingency plan implementation) relevant to the positions in which they are employed?	<u>X</u>	—	—
7:26-9.4(g)5	If yes, have facility personnel taken part in an annual review of training?	<u>X</u>	—	—
	Is there written documentation of the following:	<u>X</u>	—	—
7:26-9.4(g)5i	Job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job?	<u>X</u>	—	—
7:26-9.4(g)5ii	A written job description for each position related to hazardous waste management?	<u>X</u>	—	—
7:26-9.4(g)5iii	A written description of the type and amount of both introductory and continuing training given to personnel in jobs related to hazardous waste management?	<u>X</u>	—	—
7:26-9.4(g)5iv	Documentation of actual training or experience received by personnel?	<u>X</u>	<u>X</u>	—
7:26-9.4(g)7	Are training records kept on all employees for at least three (3) years?	<u>X</u>	—	—
7:26-9.4(g)8	Are semi-annual drills conducted involving all employees and appropriate local authorities to test emergency response capabilities at the facility in accordance with the contingency plan and emergency procedures development pursuant to NJAC 7:26-9.7?	—	<u>X</u>	—

drills held annually

		YES	NO	N/A
7:26-9.6	<u>Preparedness and prevention</u>			
	Does the facility comply with preparedness and prevention requirements including maintaining:			
7:26-9.6(b)1	<u>An internal communications or alarm system?</u>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
7:26-9.6(b)2	A <u>telephone</u> or other device to summon emergency assistance from local authorities?	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	
7:26-9.6(b)3	<u>Portable fire equipment</u> , spill control equipment, and decontamination equipment?	<input checked="" type="checkbox"/>		
7:26-9.6(b)4	<u>Water</u> at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems?			<i>undetermined</i>
7:26-9.6(c)	Is equipment tested and maintained?	<input checked="" type="checkbox"/>		
7:26-9.6(d)1	Is there immediate access to <u>communications</u> or alarm systems <u>during handling of hazardous waste?</u>		<input checked="" type="checkbox"/>	
7:26-9.6(e)	<u>Adequate aisle space</u> to allow unobstructed movement of personnel fire protection equipment, spill control equipment and decontamination equipment?	<input checked="" type="checkbox"/>		
	If no, please explain.			
	In your opinion, do the types of waste on site require all of the above procedures, or are some not required?			
	Explain. <i>Probably required.</i>			
7:26-9.6(f)	Has the facility made the following arrangements, as appropriate for the <i>the</i> type of waste handled on site?			
7:26-9.6(f)1	<u>Familiarize police, fire departments and emergency response teams with the layout of the facility and hazardous waste handled?</u>	<input checked="" type="checkbox"/>		

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.6(f)2	Where more than one police and fire department might respond to an emergency, is there an agreement designating <u>primary emergency authority</u> to a specific police or fire department, and agreements with any others to provide support to the primary emergency authority?	—	—	<u>X</u>
7:26-9.6(f)3	Agreements with emergency response contractors, and equipment suppliers? <u>HESS OIL</u>	<u>X</u>	—	—
7:26-9.6(f)4	Arrangements to familiarize local hospitals with the properties of hazardous waste handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or discharges at the facility?	<u>X</u>	—	—
7:26-9.6(f)5	Arrangements with local fire departments to inspect the facility on a regular basis with at least two (2) inspections annually?	—	—	—
7:26-9.7	<u>Contingency plan and emergency procedures</u>			
7:26-9.7(a)	Does the facility have a <u>written contingency plan</u> for emergency procedures designed to deal with fires, explosions, hazards to human health or environment, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil or surface water?	<u>X</u>	—	—
7:26-9.7(b)	Are provisions of the plan carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment?	—	—	<u>X</u>
7:26-9.7(c)	Does the contingency plan describe the actions facility personnel shall take in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility?	<u>X</u>	—	—
7:26-9.7(d)	Did the owner or operator prepare a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112 or 151 or a Discharge Prevention, Containment and Countermeasure (DPCP) Plan in accordance with N.J.A.C. 7:1E-4.1 <u>et seq.</u> ?	<u>X</u>	—	—
	If yes, did the owner or operator amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of this section?	<u>X</u>	—	—

7:26-9.7(e)

Does the plan describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and State and local emergency response teams to coordinate emergency services?

X plan has been sent to all concerned however

7:26-9.7(f)

Does the plan list names, addresses, and phone numbers (office and home) of all persons qualified to act as emergency coordinator and is this list kept up-to-date? Where more than one person is listed, one shall be named as primary emergency coordinator and others shall assume responsibility as alternates.

X

7:26-9.7(g)

Does the plan include a list of all emergency equipment at the facility (such as fire extinguishing systems, spill control equipment, communications and alarm systems (internal and external), and decontamination equipment), where this equipment is required? Is the list kept up-to-date? In addition, does the plan include the location and a physical description of each item on the list, and a brief outline of its capabilities?

X

7:26-9.7(h)

Does the plan include an evacuation procedure for facility personnel where there is a possibility that evacuation could be necessary? Does this plan describe signal(s) to be used to begin evacuation, evacuation routes, and alternative evacuation routes (in cases where the primary routes could be blocked by releases of hazardous waste or fires)?

X

7:26-9.7(i)

Is a copy of the contingency plan and all revisions to the plan:

1. Maintained at the facility; and

X

2. Has the contingency plan been submitted to local authorities (police, fire departments, emergency response teams)?

X

7:26-9.8

Closure plan

7:26-9.8(c)

Does the facility have a written closure plan?

X

Does the owner/operator keep a written copy of the closure plan and all revisions to the plan at the facility?

X

If yes, does the plan include:

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.8(e)1i	A description of how and when the facility will be partially closed (if applicable) and ultimately closed?	<u>X</u>	<u> </u>	<u> </u>
7:26-9.8(e)1ii	The maximum extent of the operation which will be open during the life of the facility?	<u>X</u>	<u> </u>	<u> </u>
7:26-9.8(e)2	An estimate of the maximum inventory of wastes in storage or in treatment at any given time during the life of the facility?	<u>X</u>	<u> </u>	<u> </u>
7:26-9.8(e)3	A description of the steps needed to decontaminate facility equipment during closure?	<u>X</u>	<u> </u>	<u> </u>
7:26-9.8(e)4	A schedule for final closure including the anticipated date when the wastes will no longer be received, the date when completion of final closure is anticipated, and intervening milestone dates which will allow tracking of the progress of closure?	<u> </u>	<u>X</u>	<u> </u>
	<u>Post Closure Plan</u>			
7:26-9.9(g)	Does the facility have a written post-closure plan kept at the facility?	<u> </u>	<u>X</u>	<u> </u>
	If yes, does the plan:			
7:26-9.9(i)	Identify the activities which will be carried on after closure and the frequency of these activities?	<u> </u>	<u> </u>	<u>X</u>
7:26-9.9(i)1	Include a description of the planned ground-water monitoring activities and frequencies at which they will be performed?	<u> </u>	<u> </u>	<u> </u>
7:26-9.9(i)2	Include a description of the planned maintenance activities, and frequency at which they will be performed, to insure the following:	<u> </u>	<u> </u>	<u> </u>
7:26-9.9(i)2i	The integrity of the cap and final cover or other containment structures where applicable?	<u> </u>	<u> </u>	<u> </u>
7:26-9.9(i)2ii	Describe the function of the facility monitoring equipment?	<u> </u>	<u> </u>	<u> </u>
7:26-9.9(i)3	Include the name, address and phone number of a person or office to contact about the disposal facility during the post-closure period?	<u> </u>	<u> </u>	<u> </u>
	Does the owner/operator have a written estimate of the cost of post-closure for the facility?	<u> </u>	<u> </u>	<u> </u>
	If yes, what is it?			

Please circle all appropriate activities and answer questions on indicated pages for all activities circled.

<u>Storage</u>	<u>Treatment</u>	<u>Disposal</u>
<u>Container</u> - pg. 9	Tank - pg. 12	Landfill - pg. 13
Tank, above ground - pg. 12	Surface Impoundments - pg. 15	
<u>Tank</u> , below ground - pg. 12	Incineration - pg. 20	Surface Impoundments - pg. 15
Surface Impoundments - pg. 15	Thermal Treatment - pg. 23	Other _____
Waste Piles - pg. 17		
Other _____	<u>Chemical, Physical and Biological Treatment</u> - pg. 25	
	Other _____	

YES NO N/A

7:26-9.4(d)

Containers

What type of containers are used for storage?
Describe the size, type, quantity and nature of wastes (e.g., 12 fifty-five gallon drums of waste acetone)

*55 gallon drums
waste oil, corrosive*

7:26-10.4(b)

Is there a containment system for spills, leaks and precipitation?

X

Is yes, describe the containment system.

*Consists of
a 6" concrete
berm beveled
to a drain which
then leads to tank
when open or serves
as a blind sump.*

7:26-9.4(d)1i

Do the containers appear to be of sturdy leak-proof construction of adequate wall thickness, weld, hinge and seam strength, and of sufficient material strength to withstand side and bottom shock, while filled, without impairment of the container's ability to contain hazardous waste?

X

If no, explain.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(d)1ii	Are the lids, caps, hinges or other closure devices of sufficient strength that when closed, they will withstand dropping, overturning or other shock without impairment of the container's ability to contain hazardous waste?	<u>X</u>	<u>X</u>	<u> </u>
	If no, explain. <i>Some drums have duct tape the emergency ports.</i>			
7:26-9.4(d)2	Do the containers appear to be in good condition, not in danger of leaking?	<u>X</u>	<u> </u>	<u> </u>
7:26-9.4(d)2	If not, please describe the type, condition and number of leaking or corroded containers. Be detailed and specific.			<u>N/A</u>
7:26-9.4(d)4i	Are all containers securely closed, except those in use, so that there is no escape of hazardous waste or its vapors?			<i>questionable due to 9.4 d iii (above)</i>
	If no, explain.			
7:26-9.4(d)4iii	Do containers appear to be properly opened, handled or stored in a manner which will minimize the risk of the container rupturing or leaking?	<u>X</u>	<u> </u>	<u> </u>
	If no, explain.			
7:26-9.4(d)iv	Are containerized hazardous wastes segregated in storage by waste type?	<u>X</u>	<u> </u>	<u> </u>
7:26-9.4(d)v	Are containerized hazardous wastes arranged so that their identification label is visible?	<u> </u>	<u> </u>	<u>X</u>
7:26-9.4(d)3	Are hazardous wastes stored in containers made of compatible materials?	<u>X</u>	<u> </u>	<u> </u>

		YES	NO	N/A
7:26-9.4(d)5	Does the owner/operator inspect the container storage area at least daily, looking for leaks and for deterioration caused by corrosion or other factors?	<u>X</u>	<u> </u>	<u> </u>
7:26-9.4(d)6	Are containers holding ignitable and reactive waste located at least 50 feet (15 meters) away from the facility's property line?	<u>X</u>	<u> </u>	<u> </u>
7:26-9.4(d)7i	Are incompatible wastes, or incompatible wastes and materials placed in the same container?	<u> </u>	<u>X</u>	<u> </u>
	If yes, explain.			
7:26-9.4(d)7ii	Are hazardous wastes placed in unwashed containers that previously held incompatible wastes?	<u> </u>	<u>X</u>	<u> </u>
	If yes, explain.			
<u>7:26-9.4(d)iii</u>	Are containers holding hazardous waste that are incompatible with any waste or other materials stored nearby in other containers, open tanks, or surface impoundments separated from the other materials or protected from them by means of a dike, berm, wall or other device?	<u> </u>	<u>undetermined</u>	<u> </u>
7:26-9.4(e)ii	Are ignitable, reactive or incompatible wastes protected from sources of ignition or reaction?	<u>X</u>	<u> </u>	<u>X</u>
	If no, explain.			
7:26-9.4(e)iii	Does the owner/operator confine smoking and open flames to specially designated locations when ignitable or reactive wastes are being handled?	<u> </u>	<u> </u>	<u>X</u>
	If no, explain.			

		<u>YES</u>	<u>NO</u>	<u>NA</u>
7:26-9.4(e)1iii	Does the owner/operator conspicuously place "No Smoking" signs whenever there is a hazard from ignitable or reactive waste?	<u>X</u>	—	—
	is the treatment, storage or disposal of ignitable or reactive waste, and the mixture of incompatible wastes and materials, conducted so that it does not:			
7:26-9.4(e)2i	Generate extreme heat or pressure, fire or explosion, or violent reaction?	—	—	—
7:26-9.4(e)2ii	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	—	—	—
7:26-9.4(e)2iii	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	—	—	—
7:26-9.4(e)2iv	Damage the structural integrity of the device or facility containing the waste?	—	—	—
7:26-9.4(e)2v	Threaten human health or the environment?	—	—	—

Could not be determined

7:26-11.2

Tanks

What are the approximate number and size of tanks containing hazardous waste?

1 6K tank

Identify the waste treated/stored in each tank.

Solvents, et tox mat.

General Operating Requirements

7:26-11.2(a)2	Are the tanks maintained so that there is no evidence of past, present, or risk of future leaks?	<u>X</u>	—	—
	If no, please explain.			
	Are there leaking tanks?	—	<u>X</u>	—

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.2(a)2	Are all hazardous wastes or treatment reagents being placed in tanks compatible with the tank material so that there is no danger of ruptures, corrosion, leaks or other failures?	<u>X</u>	—	—
7:26-11.2(3)	Do uncovered tanks have at least 2 feet of freeboard or an adequate containment structure?	<u>X</u>	—	—
7:26-11.2(a)4	If waste is continuously fed into a tank, is the tank equipped with a means to stop the inflow from the tank, e.g., bypass system to a standby tank?	<u>NO</u>	—	<u>X</u>
7:26-11.2(c)	<u>Inspections</u>			
	Is the tank(s) inspected each operating day for:			
	1. Discharge control equipment	<u>X</u>	—	—
	2. Monitoring equipment	<u>X</u>	—	—
	3. Level of waste in tank	<u>X</u>	—	—
	4. Construction of materials of the tank	<u>X</u>	—	—
	5. Are the tanks and surrounding areas (e.g., dike) inspected weekly for leaks, corrosion or other failures?	<u>X</u>	—	—
	Are there underground tanks?	—	—	—
	If yes, how many and can they be entered for inspection? <u>One - Vaulted. Access to all parts of tank.</u>	<u>X</u>	—	—
7:26-11.2(e)	Are ignitable or reactive wastes stored in a manner which protects them from a source of ignition or reaction?	—	—	<u>X</u>
	If no, please explain.			
7:26-11.2(f)	Does it appear that incompatible wastes are being stored separate from each other?	—	—	<u>X</u>
7:14A-6	<u>Groundwater monitoring</u>			
	(Applies only to: surface impoundments, landfills, land disposal facilities.)	—	—	<u>X</u>

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:14A-6.2	Does the owner/operator have a groundwater monitoring plan approved by the Department and capable of determining the facility's impact on the quality of groundwater?	—	—	—
	If no, please explain.			
	How many monitoring wells has the facility installed?			
	What is the depth to groundwater?			
	How many deep monitoring wells are on site? (Indicate depth of monitoring wells.)			
	How many shallow monitoring wells are on site? (Indicate depth of monitoring wells.)			
7:14A-6.3.a)	Is the groundwater monitoring system capable of yielding groundwater samples for analysis?	—	—	—
	If no, please explain.			
7:14A-6.3.a)1	Are monitoring wells installed hydraulically upgradient?	—	—	—
	If yes, specify how many and the depth of each.			

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:14A-6.3(a)2	How many monitoring wells are installed hydraulically down gradient? If yes, specify how many and the depth of each.	—	—	—
7:14A-6.4(a)	Does the owner/operator have a groundwater sampling and analysis plan? If no, please explain.	—	—	—
7:14A-6.4(a)	Does the plan include procedures and techniques for:			
	1. Sample collection	—	—	—
	2. Sample preservation and shipment	—	—	—
	3. Analytical procedures	—	—	—
	4. Chain of custody	—	—	—
7:26-11.3	<u>Surface Impoundments</u> Describe the design and operating features of the surface impoundment to prevent groundwater contamination, e.g., liner leachate collection system. Give the approximate size of surface impoundment in cubic feet. Please specify whether the waste stored is treated.			
7:26-11.3(a)	Is there at least 2 feet of freeboard in the impoundment?	—	—	—

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.3(b)	Do all earthen dikes have a protective cover to preserve their structural integrity?	—	—	—
	If yes, please specify the type of covering.			
7:26-9.4(b)1	Does the owner/operator have a detailed chemical and physical analysis of a representative sample of the waste in the impoundment?	—	—	—
7:26-9.4(c)2	Does the owner/operator place the results from each waste analysis and trial test, or the documented information, in the operating record of the facility?	—	—	—
7:26-11.3(d)	Does the owner or operator inspect:			
7:26-11.3(d)1	The freeboard level at least once each operating day to ensure compliance with subsection 11.3(a)?	—	—	—
7:26-11.3(d)2	The surface impoundment, including dikes and vegetation surrounding the dike, at least once a week to detect any leaks, deterioration or failures in the impoundment?	—	—	—
7:26-11.3(f)	Is ignitable or reactive waste placed in the surface impoundment?	—	—	—
7:26-11.3(f)1	If yes, is the waste treated, rendered, or mixed before or immediately after placement in the impoundment?	—	—	—
7:26-11.3(f)1i	Does the resulting waste, mixture, or dissolution of material no longer meet the definition of ignitable or reactive waste?	—	—	—
7:26-11.3(f)1ii	Is the waste treated, rendered or mixed so that it does not?			
7:26-9.4(e)2i	Generate extreme heat or pressure, fire or explosion, or violent reaction?	—	—	—
7:26-9.4(e)2ii	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	—	—	—
7:26-9.4(e)2iii	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	—	—	—

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(e)2iv	Damage the structural integrity of the device or facility containing the waste?	___	___	___
7:26-9.4(e)2v	Threaten human health or the environment?	___	___	___
7:26-11.3(f)2	Is the surface impoundment used solely for emergencies?	___	___	___
7:26-11.3(g)	Are incompatible wastes, or incompatible wastes and materials placed in the same surface impoundment?	___	___	___
	If yes, is the waste managed so that it does not:			
7:26-9.4(e)2i	Generate extreme heat or pressure, fire or explosion, or violent reaction?	___	___	___
7:26-9.4(e)2ii	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	___	___	___
7:26-9.4 e.2iii	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	___	___	___
7:26-9.4(e)2iv	Damage the structural integrity of the device or facility containing the waste?	___	___	___
7:26-9.4(e)2v	Threaten human health or the environment?	___	___	___
	<u>Waste Piles</u>			
	How many waste piles are on-site and approximately how large are they? (Please indicate size and height and types of wastes in piles.)			
	Is the waste pile protected from wind erosion?	___	___	___
	a) Does it appear to need such protection?	___	___	___
	b) Explain what type of protection does exist.			
7:26-9.3(a)E1	Is the waste pile larger than 200 cubic yards?	___	___	___

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.3(a)5ii	Is the pile placed on an impermeable base that is compatible with the waste?	---	---	---

If no, explain.

7:26-9.3(a)5iii	Is run-on diverted away from the pile?	---	---	---
-----------------	--	-----	-----	-----

7:26-9.3(a)5iv	Is leachate and run-off from the pile collected and managed as a hazardous waste?	---	---	---
----------------	---	-----	-----	-----

7:26-11.4 Landfills

Identify the types of waste and size of the landfill.

General Operating Requirements

7:26-11.4(a)1	Is run-on diverted away from all portions of the landfill?	---	---	---
---------------	--	-----	-----	-----

7:26-11.4(a)2	Is run-off from active portions of the landfill collected?	---	---	---
---------------	--	-----	-----	-----

7:26-11.4(a)3	Is waste which is subject to wind dispersal controlled?	---	---	---
---------------	---	-----	-----	-----

Please Explain how.

7:26-11.4(a)4	Does waste disposal or the disposal operation occur within 200 feet (60.6 meters) of the property boundary?	---	---	---
---------------	---	-----	-----	-----

7:26-11.4(a)6	Are untreated, ignitable, or reactive wastes placed in the landfill?	---	---	---
---------------	--	-----	-----	-----

If yes, explain.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.4(a)7	Are incompatible wastes, or incompatible wastes and materials placed in the same hazardous waste landfill cell?	—	—	—
	If yes, explain.			
7:26-11.4(a)8	Are bulk or non-containerized liquid waste or waste containing free liquids placed in a hazardous waste landfill?	—	—	—
	If yes:			
7:26-11.4(a)8i	Does the hazardous waste landfill have a liner which is chemically and physically resistant to the added liquid and a functioning leachate collection and removal system with a capacity sufficient to remove all leachate produced?	—	—	—
7:26-11.4(a)8ii	Before disposal, is the liquid waste or waste containing free liquids treated or stabilized, chemically or physically, so that free liquids are no longer present?	—	—	—
7:26-11.4(a)9	Are containers holding liquid waste or waste containing free liquids placed in a hazardous waste landfill?	—	—	—
	If yes:			
7:26-11.4(a)9i	Is the container designed to hold liquids or free liquids for a use other than storage, such as a battery?	—	—	—
7:26-11.4(a)9ii	Is the container very small, such as an ampule?	—	—	—
7:26-11.4(a)10	Are empty containers crushed flat, shredded, or similarly reduced in volume before it is buried beneath the surface of a hazardous waste landfill?	—	—	—
7:26-11.4(a)11	Does the owner or operator of a hazardous waste landfill continue to dispose of hazardous wastes subsequent to the detection of any liquid, in the secondary collection system?	—	—	—
7:26-11.4(b)	Does the owner or operator of a hazardous waste landfill maintain an operating record required in N.J.A.C. 7:26-9.4(a)?	—	—	—

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.4(b),1	Does the owner/operator maintain a map, the exact location and dimensions, including depth of each cell with respect to permanently surveyed bench marks?	_____	_____	_____
7:26-11.4(b)2	The contents of each cell and the appropriate location of each hazardous waste type within each cell?	_____	_____	_____
	Are containers holding liquid waste or waste containing free liquids placed in the landfill?	_____	_____	_____
	Please describe the types and contents of such containers placed in the landfill.			
	Are empty containers placed in the landfill crushed flat, shredded or similarly reduced in volume before they are buried?	_____	_____	_____
	Are small containers of hazardous waste in overpacked drums placed in the landfill?	_____	_____	_____
	If yes, please describe precautions taken to prevent the release of the waste.			
7:26-11.5	<u>Incinerator</u>			
	What type of incinerator is at the site (e.g., waterwall incinerator, boiler, fluidized bed, etc.)			
	List the types and quantities of hazardous waste incinerated.			

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
	Is the residue from the incinerator a hazardous waste?	_____	_____	_____
	What types of air pollution control devices (if any) are installed in the incinerator unit?			
	Is energy recovered from the process?	_____	_____	_____
	If yes, describe.			
	What is the destruction and removal efficiency for the organic hazardous waste constituents?			
7:26-11.5(b)1	Does the operating record include additional analysis and to determine types of pollutants which might be emitted including:			
7:26-11.5(b)ii	Heating value of the waste?	_____	_____	_____
7:26-11.5(b)iii	Halogen and sulfur content?	_____	_____	_____
7:26-11.5(b)iiii	Concentrations of lead and mercury?	_____	_____	_____
7:26-11.5(2)	If no to any of the above questions, is there justification and documentation?	_____	_____	_____
	If operating, does it appear the incinerator is operating at steady state for conditions of operation, including temperature and air flow?/	_____	_____	_____
	<u>Monitoring and Inspection</u>			
7:26-11.5(c)1	Are existing instruments relating to combustion and emission controls monitored every 15 minutes?	_____	_____	_____
	If no, explain.			

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.5(c)1	Does the incinerator have all the following instruments for measuring: wastefeed, auxiliary fuel feed air flow, incinerator temperature scrubber flow, and scrubber pH? (Circle missing instruments.)	___	___	___
	If no, explain.			
7:26-11.5(c)2	Is the stack plume observed visually at least hourly for opacity and color?	___	___	___
7:26-11.5(c)3	Are there any signs of leaks, spill and fugitive emission associated with the pumps, valves, conveyors, pipes, etc?	___	___	___
	If yes, describe.			
7:26-11.5(c)3	Are all emergency shutdown controls and system alarms checked to assure proper operation?	___	___	___
	Is there any reason to believe the incinerator is being operated improperly? i.e., steady state conditions are not maintained.	___	___	___
	If yes, explain.			
7:26-11.5(c)3	Is the incinerator inspected daily?	___	___	___
7:26-11.5(e)	Is there open burning of hazardous waste?	___	___	___
	If yes, what is being burned? (Only burning or detonation of explosives is permitted.)			
	If open burning or detonation of explosives is taking place, approximately what is the distance from the open burning or detonation to the property of others?			

	<u>YES</u>	<u>NO</u>	<u>N/A</u>
Are containers holding liquid waste, or waste containing free liquids placed in the landfill?	_____	_____	_____
Please describe the types and contents of such containers placed in the landfill.			
Are empty containers placed in the landfill crushed flat, shredded or similarly reduced in volume before they are buried?	_____	_____	_____
Are small containers of hazardous waste in overpacked drums placed in the landfill?	_____	_____	_____
If yes, please describe precautions taken to prevent the release of the waste.			

7:26-11.6

Thermal Treatment

What type of thermal treatment is at the site (e.g., waterwall incinerator, boiler, fluidized bed, etc.)

List the types and quantities of hazardous waste thermally treated.

Is the residue from the thermal treatment unit a hazardous waste?

What types of air pollution control devices (if any) are installed in the thermal treatment unit?

	<u>YES</u>	<u>NO</u>	<u>N/A</u>
Is energy recovered from the process?	___	___	___

If yes, describe.

What is the destruction and removal efficiency for the organic hazardous waste constituents?

7:26-11.6(b)1 Does the operating record include additional analysis and to determine types of pollutants which might be emitted including:

7:26-11.6(b)1i Heating value of the waste?

7:26-11.6(b)1ii Halogen and sulfur content?

7:26-11.6(b)1iii Concentrations of lead and mercury?

7:26-11.6(2) If no to any of the above questions, is there justification and documentation?

If operating, does it appear the thermal treatment unit is operating at steady state for conditions of operation, including temperature and air flow?

Monitoring and Inspection

Are existing instruments relating to combustion and emission controls monitored every 15 minutes?

If no, explain.

7:26-11.6(c)1 Does the thermal treatment have all the following instruments for measuring: wastefeed, auxiliary fuel feed air flow, incinerator temperature scrubber flow, and scrubber pH?
Circle/misleading instruments.

If no, explain.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.6(c)2	Is the stack plume observed visually at least hourly for opacity and color?	___	___	___
7:26-11.6(c)3	Are there any signs of leaks, spill and fugitive emission associated with the pumps, valves, conveyors, pipes, etc?	___	___	___
	If yes, describe.			
7:26-11.6(c)3	Are all emergency shutdown controls and system alarms checked to assure proper operation?	___	___	___
	Is there any reason to believe the thermal treatment unit is being operated improperly? i.e., steady state conditions are not maintained.	___	___	___
	If yes, explain.			
7:26-11.6(c)3	Is the thermal treatment inspected daily?	___	___	___
7:26-11.6(e)	Is there open burning of hazardous waste?	___	___	___
	If yes, what is being burned? (Only burning or detonation of explosives is permitted.)			
	If open burning or detonation of explosives is taking place, approximately what is the distance from the open burning or detonation to the property of others?			

7:26-11.7 Chemical, Physical and Biological Treatment

Other than in tanks, surface impoundments or plant treatment facilities;

1. *the system is a plant treatment facility.*

		<u>YES</u>	<u>NO</u>	<u>NA</u>
	Describe the treatment system at this facility and the types of wastes treated.			
7:26-11.7(a)2	Does the treatment process system show any signs of ruptures, leaks or corrosion? If yes, describe.			
7:26-11.7 a)3	Is there a means to stop the inflow of continuously-fed hazardous wastes? <u>Inspections</u>			
7:26-11.7(c)1	Is the discharge control safety equipment (e.g., waste feed cut-off systems, by-pass systems, drainage systems and pressure relief systems) in good working order?			
7:26-11.7 c)1	Are they inspected at least once each operation day?			
7:26-11.7(c)2	Does the data gathered from the monitoring equipment (e.g., pressure and temperature gauges) show treatment process is operating according to design?			
7:26-11.7 c)2	Is data gathered at least once each operating day?			
7:26-11.7(c)3	Are construction materials of the treatment process inspected at least weekly to detect corrosion or leaking of flanges and seals?			
7:26-11.7 c)4	Are the discharge confinement structures (e.g., dikes) immediately surrounding the treatment unit inspected at least weekly to detect erosion or obvious signs of leakage (e.g., wet spots or dead vegetation)?			
7:26-11.7(c)1	Are ignitable or reactive waste fed into the waste treatment system treated or protected from any material or conditions which may cause it to ignite or react? If yes, explain how.			

YES NO N/A

2:26-11.7.f,

Are the incompatible wastes placed in the same treatment process?

If yes, please explain.

✓

REFERENCE NO. 7

1 GENERAL	 EPA GENERAL INFORMATION Consolidated Permit Program (Read the "General Instructions" before starting.)	EPA NO. NUMBER ENJD011328887	PLEASE PLACE LABEL IN THIS SPACE	GENERAL INSTRUCTIONS If a preprinted label has been provided, affix it in the designated space. Review the information carefully; if any of it is incorrect, cross through it and enter the correct data in the appropriate fill-in area below. Also, if any of the preprinted data is absent (the area to the left of the label space lists the information that should appear), please provide it in the proper fill-in area(s) below. If the label is complete and correct, you need not complete items I, III, V, and VI (except VI-B which must be completed regardless). Complete all items if no label has been provided. Refer to the instructions for detailed item descriptions and for the legal authorizations under which this data is collected.
I. EPA I.D. NUMBER III. FACILITY NAME V. FACILITY MAILING ADDRESS VI. FACILITY LOCATION				

II. POLLUTANT CHARACTERISTICS

INSTRUCTIONS: Complete A through J to determine whether you need to submit any permit application forms to the EPA. If you answer "yes" to any questions, you must submit this form and the supplemental form listed in the parenthesis following the question. Mark "X" in the box in the third column if the supplemental form is attached. If you answer "no" to each question, you need not submit any of these forms. You may answer "no" if your activity is excluded from permit requirements; see Section C of the instructions. See also, Section D of the instructions for definitions of bold-faced terms.

SPECIFIC QUESTIONS

A. Is this facility a publicly owned treatment works which results in a discharge to waters of the U.S.? (FORM 2A)

MARK "X"		
YES	NO	FORM ATTACHED
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

C. Is this a facility which currently results in discharges to waters of the U.S. other than those described in A or B above? (FORM 2C)

MARK "X"		
YES	NO	FORM ATTACHED
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

E. Does or will this facility treat, store, or dispose of hazardous wastes? (FORM 3)

MARK "X"		
YES	NO	FORM ATTACHED
<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

G. Do you or will you inject at this facility any produced water or other fluids which are brought to the surface in connection with conventional oil or natural gas production, inject fluids used for enhanced recovery of oil or natural gas, or inject fluids for storage of liquid hydrocarbons? (FORM 4)

MARK "X"		
YES	NO	FORM ATTACHED
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

I. Is this facility a proposed stationary source which is one of the 28 industrial categories listed in the instructions and which will potentially emit 100 tons per year of any air pollutant regulated under the Clean Air Act and may affect or be located in an attainment area? (FORM 5)

MARK "X"		
YES	NO	FORM ATTACHED
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

B. Does or will this facility (either existing or proposed) include a concentrated animal feeding operation or aquatic animal production facility which results in a discharge to waters of the U.S.? (FORM 2B)

MARK "X"		
YES	NO	FORM ATTACHED
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

D. Is this a proposed facility (other than those described in A or B above) which will result in a discharge to waters of the U.S.? (FORM 2D)

MARK "X"		
YES	NO	FORM ATTACHED
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

F. Do you or will you inject at this facility industrial or municipal effluent below the lowermost stratum containing, within one quarter mile of the well bore, underground sources of drinking water? (FORM 4)

MARK "X"		
YES	NO	FORM ATTACHED
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

H. Do you or will you inject at this facility fluids for special processes such as mining of sulfur by the Frasch process, solution mining of minerals, in situ combustion of fossil fuel, or recovery of geothermal energy? (FORM 4)

MARK "X"		
YES	NO	FORM ATTACHED
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

J. Is this facility a proposed stationary source which is NOT one of the 28 industrial categories listed in the instructions and which will potentially emit 250 tons per year of any air pollutant regulated under the Clean Air Act and may affect or be located in an attainment area? (FORM 5)

MARK "X"		
YES	NO	FORM ATTACHED
<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

III. NAME OF FACILITY

1. SKIP AT&T BELL LABORATORIES HOLMDEL

V. FACILITY CONTACT

A. NAME & TITLE (last, first, & title)

B. PHONE (area code & no.)

WYSZKOWSKI PAUL GROUP SUPERV

201 582 4868

VI. FACILITY MAILING ADDRESS

A. STREET OR P.O. BOX

600 MOUNTAIN AVE ROOM 1E229

B. CITY OR TOWN

C. STATE

D. ZIP CODE

MURRAY HILL

NJ

07974

VI. FACILITY LOCATION

A. STREET, ROUTE NO. OR OTHER SPECIFIC IDENTIFIER

CRAWFORD CORNER ROAD

B. COUNTY NAME

MONMOUTH

C. CITY OR TOWN

D. STATE

E. ZIP CODE

F. COUNTY CODE (if known)

HOLMDEL

NJ

07733

RESEARCH & DEVELOPMENT LABORATORIES

C. THIRD

D. FOURTH

(specify)

(specify)

RATOR INFORMATION

A. NAME

ELL TELEPHONE LABORATORIES INCORPORATED

IS THE FACILITY LOCATED ON TOPIAN LAND?

YES ☐ NO ☒

E. STATUS OF OPERATOR (Enter the appropriate letter into the answer box; if "Other", specify.)

B. PHONE (area code & local)

FEDERAL M - PUBLIC (other than federal or state)

P

(specify)

Corporation

201 582 4868

STATE G - OTHER (specify)

PRIVATE

C. STREET OR P.O. BOX

00 MOUNTAIN AVE

A. CITY OR TOWN

B. STATE

C. ZIP CODE

D. TOPIAN LAND

MURRAY HILL

NJ

07974

Is the facility located on topiar land?

YES ☐NO ☒

EXISTING ENVIRONMENTAL PERMITS

A. NPDES (Discharges to Surface Waters)

B. PSD (Air Emissions from Proposed Sources)

NJ0000477

C. UIC (Underground Injection of Fluids)

D. OTHER (specify)

1394

(specify) Sanitary - Holmdel Township

E. RCRA (Hazardous Wastes)

F. OTHER (specify)

NJ D011328887

(specify)

to this application a topographic map of the area extending to at least one mile beyond property boundaries. The map must show the outline of the facility, the location of each of its existing and proposed intake and discharge structures, each of its hazardous waste treatment, storage, or disposal facilities, and each well where it injects fluids underground. Include all springs, rivers and other surface water bodies in the map area. See instructions for precise requirements.

NATURE OF BUSINESS (provide a brief description)

RESEARCH AND DEVELOPMENT LABORATORIES

CERTIFICATION (see instructions)

I certify under penalty of law that I have personally examined and am familiar with the information submitted in this application and that, based on my inquiry of those persons immediately responsible for obtaining the information contained herein, I believe that the information is true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

NAME & OFFICIAL TITLE (type or print)

B. SIGNATURE

C. DATE SIGNED

Pancoast, Vice President
Finance, Personnel and General Services

6/4/84

REMARKS FOR OFFICIAL USE ONLY

FOR OFFICIAL USE ONLY

APPLICATION APPROVED	DATE RECEIVED (yr., mo., & day)
11	12 13 14 15 16 17 18 19

COMMENTS

II. FIRST OR REVISED APPLICATION

Place an "X" in the appropriate box in A or B below (mark one box only) to indicate whether this is the first application you are submitting for your facility or a revised application. If this is your first application and you already know your facility's EPA I.D. Number, or if this is a revised application, enter your facility's EPA I.D. Number in Item I above.

A. FIRST APPLICATION (place an "X" below and provide the appropriate date)

☐ 1. EXISTING FACILITY (See instructions for definition of "existing" facility. Complete item below.)

☐ 2. NEW FACILITY (Complete item below.)

FOR EXISTING FACILITIES, PROVIDE THE DATE (yr., mo., & day) OPERATION BEGAN OR THE DATE CONSTRUCTION COMMENCED (use the boxes to the left)

YR.	MO.	DAY
8	12	15

FOR NEW FACILITIES PROVIDE THE DATE (yr., mo., & day) OPERATION BEGAN OR IS EXPECTED TO BEGIN

YR.	MO.	DAY
72	12	15

B. REVISED APPLICATION (place an "X" below and complete item 1 above)

☐ 1. FACILITY HAS INTERIM STATUS

☐ 2. FACILITY HAS A RCRA PERMIT

III. PROCESSES - CODES AND DESIGN CAPACITIES

A. PROCESS CODE - Enter the code from the list of process codes below that best describes each process to be used at the facility. Ten lines are provided for entering codes. If more lines are needed, enter the code(s) in the space provided. If a process will be used that is not included in the list of codes below, then describe the process (including its design capacity) in the space provided on the form (Item III-C).

B. PROCESS DESIGN CAPACITY - For each code entered in column A enter the capacity of the process.

1. AMOUNT - Enter the amount.

2. UNIT OF MEASURE - For each amount entered in column B(1), enter the code from the list of unit measure codes below that describes the unit of measure used. Only the units of measure that are listed below should be used.

PROCESS	PROCESS CODE	APPROPRIATE UNITS OF MEASURE FOR PROCESS DESIGN CAPACITY
Storage:		
CONTAINER (barrel, drum, etc.)	S01	GALLONS OR LITERS
TANK	S02	GALLONS OR LITERS
WASTE PILE	S03	CUBIC YARDS OR CUBIC METERS
SURFACE IMPOUNDMENT	S04	GALLONS OR LITERS
Disposal:		
INJECTION WELL	D79	GALLONS OR LITERS
LANDFILL	D80	ACRE-FEET (the volume that would cover one acre to a depth of one foot) OR HECTARE-METER
LAND APPLICATION	D81	ACRES OR HECTARES
OCEAN DISPOSAL	D82	GALLONS PER DAY OR LITERS PER DAY
SURFACE IMPOUNDMENT	D83	GALLONS OR LITERS

Treatment:

PROCESS	PROCESS CODE	APPROPRIATE UNITS OF MEASURE FOR PROCESS DESIGN CAPACITY
TANK	T01	GALLONS PER DAY OR LITERS PER DAY
SURFACE IMPOUNDMENT	T02	GALLONS PER DAY OR LITERS PER DAY
INCINERATOR	T03	TONS PER HOUR OR METRIC TONS PER HOUR: GALLONS PER HOUR OR LITERS PER HOUR
OTHER (Use for physical, chemical, thermal or biological treatment processes not occurring in tanks, surface impoundments or incinerators. Describe the processes in the space provided; Item III-C.)	T04	GALLONS PER DAY OR LITERS PER DAY

UNIT OF MEASURE	UNIT OF MEASURE CODE	UNIT OF MEASURE	UNIT OF MEASURE CODE	UNIT OF MEASURE	UNIT OF MEASURE CODE
GALLONS	G	LITERS PER DAY	V	ACRE-FEET	A
LITERS	L	TONS PER HOUR	D	HECTARE-METER	F
CUBIC YARDS	Y	METRIC TONS PER HOUR	W	ACRES	S
CUBIC METERS	C	GALLONS PER HOUR	E	HECTARES	Q
GALLONS PER DAY	U	LITERS PER HOUR	H		

EXAMPLE FOR COMPLETING ITEM III (shown in line numbers X-1 and X-2 below): A facility has two storage tanks, one tank can hold 200 gallons and the other can hold 400 gallons. The facility also has an incinerator that can burn up to 20 gallons per hour.

LINE NUMBER	A. PROCESS CODE (from list above)	B. PROCESS DESIGN CAPACITY		FOR OFFICIAL USE ONLY	LINE NUMBER	A. PROCESS CODE (from list above)	B. PROCESS DESIGN CAPACITY		FOR OFFICIAL USE ONLY
		1. AMOUNT (specify)	2. UNIT OF MEASURE (enter code)				1. AMOUNT	2. UNIT OF MEASURE (enter code)	
1	S 0 2	600	G		5				
X-1	T 0 3	20	E		6				
1	S 0 2	6000	G		7				
1	S 0 1	975	G		8				
					9				
					10				

III. PROCESSES *(continued)*

C. SPACE FOR ADDITIONAL PROCESS CODES OR FOR DESCRIBING OTHER PROCESSES (code "T04"). FOR EACH PROCESS ENTERED HERE INCLUDE DESIGN CAPACITY.

IV. DESCRIPTION OF HAZARDOUS WASTES

- A. EPA HAZARDOUS WASTE NUMBER** — Enter the four-digit number from 40 CFR, Subpart D for each listed hazardous waste you will handle. If you handle hazardous wastes which are not listed in 40 CFR, Subpart D, enter the four-digit number(s) from 40 CFR, Subpart C that describes the characteristics and/or the toxic contaminants of those hazardous wastes.
- B. ESTIMATED ANNUAL QUANTITY** — For each listed waste entered in column A estimate the quantity of that waste that will be handled on an annual basis. For each characteristic or toxic contaminant entered in column A estimate the total annual quantity of all the non-listed waste(s) that will be handled which possess that characteristic or contaminant.
- C. UNIT OF MEASURE** — For each quantity entered in column B enter the unit of measure code. Units of measure which must be used and the appropriate codes are:

ENGLISH UNIT OF MEASURE CODE
POUNDS P
TONE T

METRIC UNIT OF MEASURE CODE
KILOGRAMS K
METRIC TONS M

If facility records use any other unit of measure for quantity, the units of measure must be converted into one of the required units of measure taking into account the appropriate density or specific gravity of the waste.

D. PROCESSES

1. PROCESS CODES:

For listed hazardous waste: For each listed hazardous waste entered in column A select the code(s) from the list of process codes contained in Item III to indicate how the waste will be stored, treated, and/or disposed of at the facility.

For non-listed hazardous waste: For each characteristic or toxic contaminant entered in column A, select the code(s) from the list of process codes contained in Item III to indicate all the processes that will be used to store, treat, and/or dispose of all the non-listed hazardous wastes that possess that characteristic or toxic contaminant.

Notes: Four spaces are provided for entering process codes. If more are needed: (1) Enter the first three as described above; (2) Enter "000" in the extreme right box of Item IV-D(1); and (3) Enter in the space provided on page 4, the line number and the additional code(s).

2. PROCESS DESCRIPTION: If a code is not listed for a process that will be used, describe the process in the space provided on the form.

NOTE: HAZARDOUS WASTES DESCRIBED BY MORE THAN ONE EPA HAZARDOUS WASTE NUMBER — Hazardous wastes that can be described by more than one EPA Hazardous Waste Number shall be described on the form as follows:

- Select one of the EPA Hazardous Waste Numbers and enter it in column A. On the same line complete columns B, C, and D by estimating the total annual quantity of the waste and describing all the processes to be used to treat, store, and/or dispose of the waste.
- In column A of the next line enter the other EPA Hazardous Waste Number that can be used to describe the waste. In column D(2) on that line enter "Included with above" and make no other entries on that line.
- Repeat step 2 for each other EPA Hazardous Waste Number that can be used to describe the hazardous waste.

EXAMPLE FOR COMPLETING ITEM IV (shown in line numbers X-1, X-2, X-3, and X-4 below) — A facility will treat and dispose of an estimated 900 pounds per year of chrome shavings from leather tanning and finishing operation. In addition, the facility will treat and dispose of three non-listed wastes. Two wastes are corrosive only and there will be an estimated 200 pounds per year of each waste. The other waste is corrosive and ignitable and there will be an estimated 100 pounds per year of that waste. Treatment will be in an incinerator and disposal will be in a landfill.

WASTE LINE	A. EPA HAZARDOUS WASTE NO. (enter code)	B. ESTIMATED ANNUAL QUANTITY OF WASTE	C. UNIT OF MEASURE (enter code)	D. PROCESSES	
				1. PROCESS CODES (enter)	2. PROCESS DESCRIPTION (If a code is not entered in D(1))
X-1	K054	900	P	T03D80	
X-2	D002	400	P	T03D80	
X-3	D001	100	P	T03D80	
X-4	D002				included with above

EPA I.D. NUMBER (enter from page 1)										FOR OFFICIAL USE ONLY									
WINJDO011328887										W DUP 2 DUP									

IV. DESCRIPTION OF HAZARDOUS WASTES (continued)

LINE NO.	A. EPA HAZARD. WASTE NO. (enter code)	B. ESTIMATED ANNUAL QUANTITY OF WASTE	C. UNIT OF MEASURE (enter code)	D. PROCESSES							
				1. PROCESS CODES (enter)				2. PROCESS DESCRIPTION (if a code is not entered in D(1))			
1	D 0 0 4	42,500	P	S 0 2							Mixed chemicals and
2	D 0 0 7	Included above) rinse waters placed in
3	D 0 0 8	" ") 6,000 gallon tank
4	D 0 0 9	" ")
5	X 9 0 0	" ")
6											
7	D 0 0 1 X 8 5 0	3,000	P	S 0 1							Lab pack disposal
8	D 0 0 1	1,400	P	S 0 1							Includes paint thinners
9	D 0 0 3 X 8 5 0	500	P	S 0 1							Lab pack disposal
10	D 0 0 2	9,350	P	S 0 1							Includes Hunt Etchant
11	D 0 0 2 X 8 5 0	500	P	S 0 1							Lab pack disposal
12	X 3 8 7	300	P	S 0 1							Small PCB capacitor from misc. electrical equip.
13											
14	X 8 5 0	3,000	P	S 0 1							Misc. chemicals & solvents including some "U" & "P" cla wastes
15											
16	X 7 2 1	1,870	P	S 0 1							Waste oils
17	X 7 2 5 X 7 2 6	Included above									
18											
19	D 0 0 1	1,400	P	S 0 1							Misc. spent waste solvent mixt may include F001, F002, F003, materials
20											
21	D 0 0 1	300	P	S 0 1) small quantities of materials) received from off-site
22	D 0 0 2	300	P	S 0 1) company locations including
23	F 0 0 1 F 0 0 5	300	P	S 0 1) Crawford Hill, Red Hill Road
24	X 7 2 1 X 7 2 5	300	P	S 0 1	(waste oils)) and Middletown.
25											
26											

EPA I.D. NO. (enter from page 1)

D 0 1 1 3 2 8 8 8 7 6

T/A C
6

FACILITY DRAWING

Existing facilities must include in the space provided on page 5 a scale drawing of the facility (see instructions for more detail).

PHOTOGRAPHS

Existing facilities must include photographs (aerial or ground-level) that clearly delineate all existing structures; existing storage, treatment and disposal areas; and sites of future storage, treatment or disposal areas (see instructions for more detail).

FACILITY GEOGRAPHIC LOCATION

LATITUDE (degrees, minutes, & seconds)

N 4 0 2 2 0 1 9

LONGITUDE (degrees, minutes, & seconds)

W 7 4 1 0 4 4

I. FACILITY OWNER

If the facility owner is also the facility operator as listed in Section VIII on Form 1, "General Information", place an "X" in the box to the left and skip to Section IX below.

B. If the facility owner is not the facility operator as listed in Section VIII on Form 1, complete the following items:

1. NAME OF FACILITY'S LEGAL OWNER

2. PHONE NO. (area code & no.)

3. STREET OR P.O. BOX

4. CITY OR TOWN

5. ST.

6. ZIP CODE

G

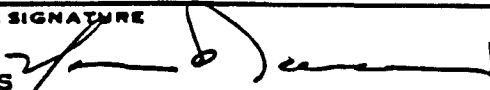
OWNER CERTIFICATION

I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

NAME (print or type)

B. SIGNATURE

C. DATE SIGNED

Pancoast, Vice President
Office, Personnel and General Services

6/4/84

OPERATOR CERTIFICATION

I certify under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the submitted information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

NAME (print or type)

B. SIGNATURE

C. DATE SIGNED

REFERENCE NO. 8



State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION

DIVISION OF WASTE MANAGEMENT
32 E. Hanover St., CN 028, Trenton, N.J. 08625

DR. MARWAN M. SADAT, P.E.
DIRECTOR

LINO F. PEREIRA, P.E.
DEPUTY DIRECTOR

26 JUN 1984

Paul E. Wyszowski, P.E.
Group Supervisor, Environmental Management Group
AT&T Bell Laboratories
600 Mountain Avenue
Murray Hill, NJ 07974

RE: Revised Part A Applications for AT&T Bell Laboratories

1. Holmdel, EPA ID NO. NJD011328887
2. Crawford Hill, EPA ID NO. NJD000799072

Dear Mr. Wyszowski:

The Bureau of Hazardous Waste Engineering (the Bureau) is in receipt of your revised Part A application for the above referenced facilities. The Bureau has reviewed the subject submittals and notes the following:

Holmdel Plant NJD 011328887

The company's original Part A application submitted to the USEPA listed the following activities:

1. Storage in tanks (S02), design capacity 6,000 gallons;
2. Storage in containers (S01), design capacity 110 gallons.

The hazardous waste types and their estimated annual quantities included D001 (1,000P), D002 (1,000P), D003 (1,000P), F008 (100P), F009 (3,000P), P098 (500P), U002 (475P), U003 (6P), U044 (12P), U134 (15P), U151 (10P), U159 (40P), U211 (10P), U220 (60P), U226 (230P), U239 (60P).

The revised Part A application listed the following activities:

1. Storage in tanks (S02) - no change ✓
2. Storage in containers (S01), design capacity 575 gallons. ✓

Types of hazardous wastes and their estimated annual quantities include D001 (2640P), D002 (42,800P), D003 (1,000P), F001 (300P), F005 (300P), F009 (7,000P), waste oil (1870P).

— Please turn over for end page

26 JUN 81

Crawford Hill Plant

The company's original Part A application submitted to the USEPA listed the following activities:

1. Storage in tanks (S02) - design capacity 2,000 gallons

The types of wastes and their estimated annual quantities include U002 (250P), U044 (25P), U159 (10P), U220 (10P), U228 (350P), U239 (10P), D001 (500P), D002 (500P), D003 (500P).

The revised Part A application lists the following activities:

1. Storage in tanks (S02) - no change

The types of wastes and their estimated annual quantities include D008, D009, D002 (170,000P total waste).

The Bureau hereby accepts the revised Part A applications for the above referenced facilities, and will request that the USEPA revise its RCRA databank accordingly.

If you have any questions relative to this matter, please feel free to contact Ali Chaudhry of my staff at (609) 633-7714.

Very truly yours,

Thomas Sherman for

Frank Coolick, Chief
Bureau of Hazardous Waste Engineering

EP11/ch

c: Joel Golumbek, USEPA
Dr. Richard Baker, USEPA

REFERENCE NO. 9



Rom

13-1-65

State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION

DIVISION OF WASTE MANAGEMENT
32 E. Hanover St., CN 028, Trenton, N.J. 08625

DR. MARWAN M. SADAT, P.E.
DIRECTOR

LINO F. PEREIRA, P.E.
DEPUTY DIRECTOR

06 DEC 1985

CERTIFIED MAIL - RETURN RECEIPT REQUESTED

Mr. Paul E. Wyszkowski, P.E.
Group Supervisor, Environmental Management Group
AT&T Bell Laboratories
600 Mountain Avenue
Murray Hill, New Jersey 07974

RE: AT&T, Holmdel
EPA ID NO. NJD 011 328 887

Dear Mr. Wyszkowski:

The Solid Waste Management Act (N.J.S.A. 13:1E-1 et seq.) authorized the New Jersey Department of Environmental Protection (NJDEP) to establish a program requiring permits for hazardous waste treatment, storage or disposal facilities. NJDEP has issued regulations to implement this permit program, which can be found under N.J.A.C. 7:26-1.1 et seq.

Pursuant to these regulations, specifically N.J.A.C. 7:26-12.3, your facility has been operating as an existing facility since the New Jersey Hazardous Waste Management Regulations (N.J.A.C. 7:26-1.1 et seq.) became effective on October 8, 1981. Our records show that you have submitted either Part A of the USEPA RCRA Permit Application or Part A of the New Jersey Hazardous Waste Facility Permit Application. If necessary, your Part A application shall be revised to reflect the requirements of N.J.A.C. 7:26-1.1 et seq. Forms may be obtained from this office or U.S.E.P.A. Region II at (212) 264-9880.

This letter shall constitute an official request for the complete New Jersey Hazardous Waste Facility Permit Application, which shall include items set forth in Attachment I.

Your alternative information statement and affidavit should be submitted no later than three (3) months from the date of this letter. The remaining sections of your application should be submitted no later than six (6) months from the date of this letter. Failure to submit the required application by this date shall constitute grounds for termination of existing facility status pursuant to N.J.A.C. 7:26-12.3(f)2.

06 DEC 1985

As stated above, your full application is not due until six (6) months from the date of this letter. However, I would encourage you to start work on it as early as possible because there is a significant amount of information to be submitted. All submittals should be addressed to the attention of:

Frank Coolick, Chief
Bureau of Hazardous Waste Engineering
Division of Waste Management
New Jersey Department of Environmental Protection
8 East Hanover Street
Trenton, New Jersey 08625

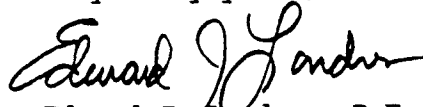
Initially, all applicants shall submit three (3) copies of the application. The Department will notify the applicant as to how many additional copies are needed for distribution to appropriate state and local authorities when it completes its initial evaluation of the application.

Should you wish to treat part of your application as confidential information, please refer to Attachment II, which outlines the procedures to be followed in making this claim.

I have taken the liberty of scheduling two (2) application conferences in order to assist you in preparing this application. These conferences have been scheduled for January 14, 1986 and March 11, 1986 at 10:00 am. These conferences will be held in the conference room, 8 East Hanover Street, Trenton, New Jersey 08625. If it is determined that one or both of these conferences is unnecessary, please notify my office of the cancellation.

Should you have any questions regarding this official request to submit your Hazardous Waste Facility Permit Application, please do not hesitate to contact me at (609) 984-6724 or the Bureau of Hazardous Waste Engineering at (609) 984-4892.

Very truly yours,



Edward J. Londres, P.E.
Assistant Director
Engineering

EP9:lk
Attachments
c: Angel Chang, USEPA

REFERENCE NO. 10

RCRA PERMIT APPLICATION
FOR
AT&T BELL LABORATORIES
HOLMDEL FACILITY
CRAWFORDS CORNER ROAD
HOLMDEL, NEW JERSEY 07733

MAY 1986



GENERAL INFORMATION

Consolidated Permit Program

(Read the "General Instructions" before starting.)

EPA ID. NUMBER

NJ D O 11328887

GENERAL

EPA ID. NUMBER

FACILITY NAME

FACILITY MAILING ADDRESS

FACILITY LOCATION

PLEASE PLACE LABEL IN THIS SPACE

GENERAL INSTRUCTIONS

If a preprinted label has been provided, place it in the designated space. Review the information carefully; if any part is incorrect, tear through it and submit the correct label. The appropriate fill-in area below, items 1 through 5, the preprinted data is about the size of the left of the label space. Use the information that should appear, place inside the proper fill-in area. Items 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41, 42, 43, 44, 45, 46, 47, 48, 49, 50, 51, 52, 53, 54, 55, 56, 57, 58, 59, 60, 61, 62, 63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82, 83, 84, 85, 86, 87, 88, 89, 90, 91, 92, 93, 94, 95, 96, 97, 98, 99, 100.

III. POLLUTANT CHARACTERISTICS

INSTRUCTIONS: Complete A through J to determine whether you need to submit any permit application forms to the EPA. If you answer "yes" to any question, you must submit this form and the supplemental form listed in the parenthesis following the question. Mark "X" in the box in the third column if the supplemental form is attached. If you answer "no" to each question, you need not submit any of these forms. You may answer "no" if your facility is excluded from permit requirements; see Section C of the instructions. See also, Section D of the instructions for definitions of bold-faced terms.

SPECIFIC QUESTIONS	MARK "X"			SPECIFIC QUESTIONS	MARK "X"		
	YES	NO	FORM ATTACHED		YES	NO	FORM ATTACHED
A. Is this facility a publicly owned treatment works which results in a discharge to waters of the U.S.? (FORM 2A)		X		B. Does or will this facility (either existing or proposed) include a concentrated animal feeding operation or aquatic animal production facility which results in a discharge to waters of the U.S.? (FORM 2B)		X	
C. Is this a facility which currently results in discharges to waters of the U.S. other than those described in A or B above? (FORM 2C)	X			D. Is this a proposed facility (either new or existing) which will result in a discharge to waters of the U.S.? (FORM 2D)		X	
E. Does or will this facility treat, store, or dispose of hazardous wastes? (FORM 3)	X			F. Do you or will you inject at this facility industrial or municipal effluent below the lowermost stratum containing, within one quarter mile of the well bore, underground sources of drinking water? (FORM 4)		X	
G. Do you or will you inject at this facility any produced water or other fluids which are brought to the surface in connection with conventional oil or natural gas production, inject fluids used for enhanced recovery of oil or natural gas, or inject fluids for storage of liquid hydrocarbons? (FORM 4)		X		H. Do you or will you inject at this facility fluids for special processes such as mining of sulfur by the Frasch process, solution mining of minerals, in situ combustion of fossil fuel, or recovery of geothermal energy? (FORM 4)		X	
I. Is this facility a proposed stationary source which is one of the 28 industrial categories listed in the instructions and which will potentially emit 100 tons per year of any air pollutant regulated under the Clean Air Act and may affect or be located in an attainment area? (FORM 5)		X		J. Is this facility a proposed stationary source which is NOT one of the 28 industrial categories listed in the instructions and which will potentially emit 250 tons per year of any air pollutant regulated under the Clean Air Act and may affect or be located in an attainment area? (FORM 5)		X	

II. NAME OF FACILITY

AT&T BELL LABORATORIES HOLMDEL

IV. FACILITY CONTACT

A. NAME & TITLE (last, first, & title)

B. PHONE (area code & no.)

WYSZKOWSKI PAUL GROUP SUPERV

201 582 4868

V. FACILITY MAILING ADDRESS

A. STREET OR P.O. BOX

600 MOUNTAIN AVE ROOM 1E229

B. CITY OR TOWN

MURRAY HILL

C. STATE

NJ

D. ZIP CODE

07974

VI. FACILITY LOCATION

A. STREET, ROUTE NO. OR OTHER SPECIFIC IDENTIFIER

ECRAWFORD CORNER ROAD

B. COUNTY NAME

MONMOUTH

C. CITY OR TOWN

HOLMDEL

D. STATE

NJ

E. ZIP CODE

07733

F. COUNTY CODE

RD (If not in order of priority)

A. FIRST		B. SECOND	
(specify) RESEARCH & DEVELOPMENT LABORATORIES		(specify)	
C. THIRD		D. FOURTH	
(specify)		(specify)	

ATOR INFORMATION

A. NAME		B. IS THE FACILITY	
LL TELEPHONE LABORATORIES INCORPORATED		Name of Facility	
C. STATUS OF OPERATOR (Enter the appropriate letter into the answer box; if "Other", specify.)		D. PHONE (area code & number)	
GENERAL ATE ATE P (specify) Corporation		201 582 4868	
E. STREET OR P.O. BOX		F. CITY OR TOWN	
MOUNTAIN AVE		RRAY HILL	
G. STATE		H. ZIP CODE	
NJ		07974	
I. IS THE FACILITY LOCATED ON INDIAN LAND?		J. YES <input type="checkbox"/> NO <input checked="" type="checkbox"/>	

ING ENVIRONMENTAL PERMITS

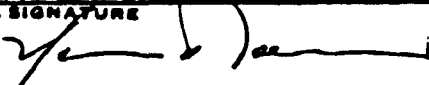
K. NPDES (Discharges to Surface Water)		L. PSD (Air Emissions from Proposed Sources)	
J0000477		1394	
M. UIC (Underground Injection of Fluids)		N. OTHER (specify)	
JD011328887		(specify) Sanitary - Holmdel Township	
O. RCRA (Hazardous Waste)		P. OTHER (specify)	
		(specify)	

With this application a topographic map of the area extending to at least one mile beyond property boundaries. The map must show the location of each of its existing and proposed intake and discharge structures, each of its hazardous waste storage, or disposal facilities, and each well where it injects fluids underground. Include all springs, rivers and other surface bodies in the map area. See instructions for precise requirements.

OF BUSINESS (provide a brief description)

RESEARCH AND DEVELOPMENT LABORATORIES

FOR OFFICIAL USE ONLY

I. I, the undersigned, declare under penalty of law that I have personally examined and am familiar with the information submitted in this application and that, based on my inquiry of those persons immediately responsible for obtaining the information contained herein, I believe that the information is true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.		
C. OFFICIAL TITLE (type or print)	D. SIGNATURE	E. DATE SIGNED
Pancoast, Vice President , Personnel and General Services		6/4/84

FOR OFFICIAL USE ONLY

10-1 (6-80) REVERSE	
---------------------	--

FOR OFFICIAL USE ONLY

APPLICATION APPROVED	DATE RECEIVED (yr., mo., & day)	COMMENTS

" FIRST OR REVISED APPLICATION

Place an "X" in the appropriate box in A or B below (mark one box only) to indicate whether this is the first application you are submitting for your facility or a revised application. If this is your first application and you already know your facility's EPA I.D. Number, or if this is a revised application, enter your facility's EPA I.D. Number in Item I above.

A. FIRST APPLICATION (Place an "X" below and provide the appropriate date)

☐ 1. EXISTING FACILITY (See instructions for definition of "existing" facility. Complete item below.)

☐ 2. NEW FACILITY (Complete item below.)

YR.	MO.	DAY

FOR EXISTING FACILITIES, PROVIDE THE DATE (yr., mo., & day) OPERATION BEGAN OR THE DATE CONSTRUCTION COMMENCED (use the boxes to the left)

YR.	MO.	DAY

FOR NEW FACILITIES PROVIDE THE DATE (yr., mo., & day) OPERATION BEGAN OR IS EXPECTED TO BEGIN

B. REVISED APPLICATION (Place an "X" below and complete item I above)

☐ 1. FACILITY HAS INTERIM STATUS

☐ 2. FACILITY HAS A RCRA PERMIT

F. PROCESSES - CODES AND DESIGN CAPACITIES

PROCESS CODE - Enter the code from the list of process codes below that best describes each process to be used at the facility. Ten lines are provided for entering codes. If more lines are needed, enter the code(s) in the space provided. If a process will be used that is not included in the list of codes below, then describe the process (including its design capacity) in the space provided on the form (Item III-C).

PROCESS DESIGN CAPACITY - For each code entered in column A enter the capacity of the process.

1. **AMOUNT** - Enter the amount.

2. **UNIT OF MEASURE** - For each amount entered in column B(1), enter the code from the list of unit measure codes below that describes the unit of measure used. Only the units of measure that are listed below should be used.

PROCESS	PROCESS CODE	APPROPRIATE UNITS OF MEASURE FOR PROCESS DESIGN CAPACITY	PROCESS	PROCESS CODE	APPROPRIATE UNITS OF MEASURE FOR PROCESS DESIGN CAPACITY
Storage:			Treatment:		
CONTAINER (barrel, drum, etc.)	S01	GALLONS OR LITERS	TANK	T01	GALLONS PER DAY OR LITERS PER DAY
TANK	S02	GALLONS OR LITERS	SURFACE IMPOUNDMENT	T02	GALLONS PER DAY OR LITERS PER DAY
WASTE PILE	S03	CUBIC YARDS OR CUBIC METERS	INCINERATOR	T03	TONS PER HOUR OR METRIC TONS PER HOUR; GALLONS PER HOUR OR LITERS PER HOUR
SURFACE IMPOUNDMENT	S04	GALLONS OR LITERS	OTHER (Use for physical, chemical, thermal or biological treatment processes not occurring in tanks, surface impoundments or incinerators. Describe the processes in the space provided; Item III-C.)	T04	GALLONS PER DAY OR LITERS PER DAY
Disposal:					
INJECTION WELL	D79	GALLONS OR LITERS			
LANDFILL	D80	ACRE-FEET (the volume that would cover one acre to a depth of one foot) OR HECTARE-METER			
LAND APPLICATION	D81	ACRES OR HECTARES			
CLEAN DISPOSAL	D82	GALLONS PER DAY OR LITERS PER DAY			
SURFACE IMPOUNDMENT	D83	GALLONS OR LITERS			
UNIT OF MEASURE	UNIT OF MEASURE CODE	UNIT OF MEASURE	UNIT OF MEASURE CODE	UNIT OF MEASURE	UNIT OF MEASURE CODE
GALLONS	G	LITERS PER DAY	V	ACRE-FEET	A
LITERS	L	TONS PER HOUR	D	HECTARE-METER	F
CUBIC YARDS	Y	METRIC TONS PER HOUR	W	ACRES	B
CUBIC METERS	C	GALLONS PER HOUR	E	HECTARES	G
GALLONS PER DAY	U	LITERS PER HOUR	H		

EXAMPLE FOR COMPLETING ITEM III (shown in line numbers X-1 and X-2 below): A facility has two storage tanks, one tank can hold 200 gallons and the other can hold 400 gallons. The facility also has an incinerator that can burn up to 20 gallons per hour.

DUP									
12 13 14 15									
LINE NUMBER	A. PROCESS CODE (from list above)	B. PROCESS DESIGN CAPACITY		FOR OFFICIAL USE ONLY	LINE NUMBER	A. PROCESS CODE (from list above)	B. PROCESS DESIGN CAPACITY		FOR OFFICIAL USE ONLY
		1. AMOUNT (specify)	2. UNIT OF MEASURE (enter code)				1. AMOUNT	2. UNIT OF MEASURE (enter code)	
1	S 0 2	600	G		5				
2	S 0 3	20	E		6				
3	S 0 2	6,000	G		7				
4	S 0 1	575	G		8				
					9				
					10				

DESCRIPTION OF HAZARDOUS WASTES

EPA HAZARDOUS WASTE NUMBER - Enter the four-digit number from 40 CFR, Subpart D for each listed hazardous waste you will handle. If you handle hazardous wastes which are not listed in 40 CFR, Subpart D, enter the four-digit number(s) from 40 CFR, Subpart C that describes the characteristic and/or the toxic contaminants of those hazardous wastes.

ESTIMATED ANNUAL QUANTITY - For each listed waste entered in column A estimate the quantity of that waste that will be handled on an annual basis. For each characteristic or toxic contaminant entered in column A estimate the total annual quantity of all the non-listed waste(s) that will be handled which possess that characteristic or contaminant.

UNIT OF MEASURE - For each quantity entered in column B enter the unit of measure code. Units of measure which must be used and the appropriate codes are:

ENGLISH UNIT OF MEASURE **CODE**
 POUNDS.....P
 TONS.....T

METRIC UNIT OF MEASURE **CODE**
 KILOGRAMS.....K
 METRIC TONS.....M

If facility records use any other unit of measure for quantity, the units of measure must be converted into one of the required units of measure taking into account the appropriate density or specific gravity of the waste.

PROCESSES

1. PROCESS CODES:

For listed hazardous waste: For each listed hazardous waste entered in column A select the code(s) from the list of process codes contained in Item III to indicate how the waste will be stored, treated, and/or disposed of at the facility.

For non-listed hazardous waste: For each characteristic or toxic contaminant entered in column A, select the code(s) from the list of process codes contained in Item III to indicate all the processes that will be used to store, treat, and/or dispose of all the non-listed hazardous wastes that possess that characteristic or toxic contaminant.

Note: Four spaces are provided for entering process codes. If more are needed: (1) Enter the first three as described above; (2) Enter "000" in the extreme right box of Item IV-D(1); and (3) Enter in the space provided on page 4, the line number and the additional code(s).

2. PROCESS DESCRIPTION: If a code is not listed for a process that will be used, describe the process in the space provided on the form.

3. HAZARDOUS WASTES DESCRIBED BY MORE THAN ONE EPA HAZARDOUS WASTE NUMBER - Hazardous wastes that can be described by more than one EPA Hazardous Waste Number shall be described on the form as follows:

Select one of the EPA Hazardous Waste Numbers and enter it in column A. On the same line complete columns B, C, and D by estimating the total annual quantity of the waste and describing all the processes to be used to treat, store, and/or dispose of the waste.

2. In column A of the next line enter the other EPA Hazardous Waste Number that can be used to describe the waste. In column D(2) on that line enter "Included with above" and make no other entries on that line.

1. Repeat step 2 for each other EPA Hazardous Waste Number that can be used to describe the hazardous waste.

SAMPLE FOR COMPLETING ITEM IV (shown in line numbers X-1, X-2, X-3, and X-4 below) - A facility will treat and dispose of an estimated 900 pounds per year of chrome shavings from leather tanning and finishing operation. In addition, the facility will treat and dispose of three non-listed wastes. Two wastes are corrosive only and there will be an estimated 200 pounds per year of each waste. The other waste is corrosive and ignitable and there will be an estimated 100 pounds per year of that waste. Treatment will be in an incinerator and disposal will be in a landfill.

LINE NUMBER	A. EPA HAZARDOUS WASTE NUMBER (enter code)	B. ESTIMATED ANNUAL QUANTITY OF WASTE	C. UNIT OF MEASURE (enter code)	D. PROCESSES			
				1. PROCESS CODES (enter)		2. PROCESS DESCRIPTION (if a code is not entered in D(1))	
1	K054	900	P	T03	D80		
2	D002	400	P	T03	D80		
3	D001	100	P	T03	D80		
4	D002					Included with above	

U.S. I.D. NO. (enter from page 1)											
J	D	0	1	1	3	2	8	8	8	7	6
											6

CITY DRAWING

Existing facilities must include in the space provided on page 5 a scale drawing of the facility (see instructions for more detail).

PHOTOGRAPHS

Existing facilities must include photographs (aerial or ground-level) that clearly delineate all existing structures; existing storage, treatment and disposal areas; and sites of future storage, treatment or disposal areas (see instructions for more detail).

FACILITY GEOGRAPHIC LOCATION

LATITUDE (degrees, minutes, & seconds)										LONGITUDE (degrees, minutes, & seconds)									
N	4	0	2	2	0	1	9			W	7	4	1	0	4	4			
11 12 13										14 15 16 17 18 19 20 21 22									

FACILITY OWNER

If the facility owner is also the facility operator as listed in Section VIII on Form 1, "General Information", place an "X" in the box to the left and skip to Section IX below.

If the facility owner is not the facility operator as listed in Section VIII on Form 1, complete the following items:

1. NAME OF FACILITY'S LEGAL OWNER										2. PHONE NO. (area code & no.)									
3. STREET OR P.O. BOX										4. CITY OR TOWN									
5. ST.										6. ZIP CODE									

OWNER CERTIFICATION

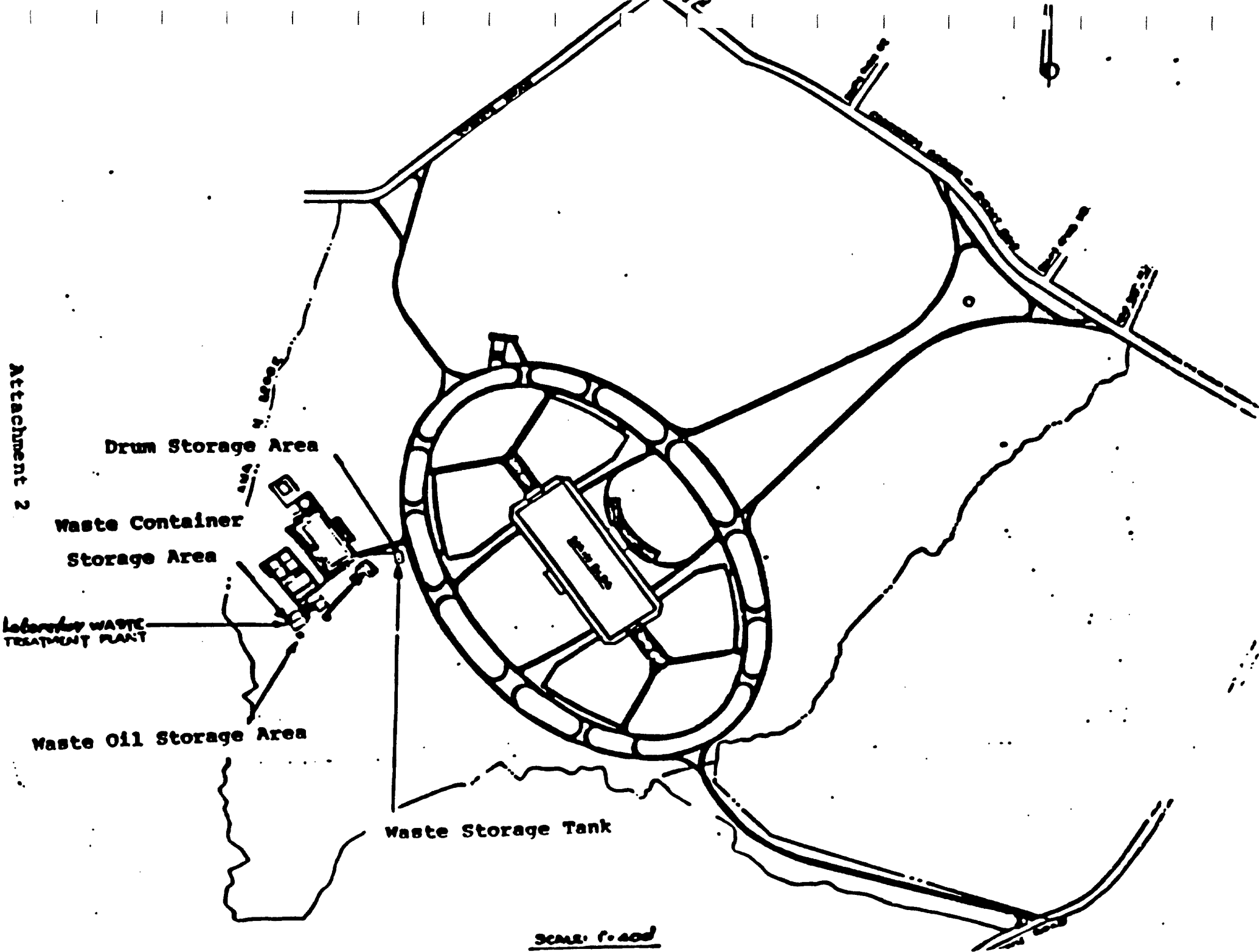
I, under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

A. (Print or type) F. No. 1, Vice President Personnel and General Services	B. SIGNATURE 	C. DATE SIGNED 6/4/84
--	--	--------------------------

OPERATOR CERTIFICATION

I, under penalty of law that I have personally examined and am familiar with the information submitted in this and all attached documents, and that based on my inquiry of those individuals immediately responsible for obtaining the information, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.

A. (Print or type)	B. SIGNATURE	C. DATE SIGNED



1.0 GENERAL FACILITY DESCRIPTION AND LOCATION INFORMATION

The Holmdel facility of AT&T Bell Laboratories is located at Crawford Corners Road in Holmdel Township, Monmouth County, New Jersey. The facility consists of a large main building surrounded by several small buildings situated on approximately 500 acres. The facility consists of laboratories and offices employing approximately 8,000 employees who perform communications-related research.

The hazardous waste facilities at the Holmdel facility are situated at two locations on the site:

- (1) A 6,000-gallon concentrated waste storage tank is constructed of lined steel and located below grade within a concrete vault. Adjacent to this tank is a diked concrete slab where the liquid waste in drums is stored.
- (2) A small container storage area is located within the laboratory wastewater treatment facility; the area consists of two masonry block rooms and one flammable liquid storage cabinet.

The tank vault is constructed of concrete, has inside dimensions of 11 feet by 21 feet by 12-1/2-feet deep and has a wall thickness of 14 inches. The vault has both an internal and external coating, and is equipped with a sump pump and a ventilation system.

A steel grating is located above the tank at the top of the vault. A wood-framed asphalt-shingled roof covers the waste liquid storage tank and vault system.

The concentrated waste storage tank receives small quantities of miscellaneous liquid wastes from research and development laboratories within the main building. These wastes are fed into the tank through a manual pouring station. The majority of the wastes that are poured into the tank are

miscellaneous solvents which primarily include acetone, methanol, trichloroethane, and trichloroethylene. Approximately once per year the contents of the tank are removed off site for treatment. The proper manifests are completed for this removal.

The drum storage area is comprised of a 14 foot 2 inch by 39 foot 6 inch concrete pad with 6-inch-high curbing on three sides. The pad slopes away from the noncurbed side toward a collection drain. This drain is connected to the concentrated waste storage tank. The drums are stored within this area on wooden pallets.

The materials that are stored in the drum storage area are waste liquids that normally are limited to spent etching solution and waste paint thinner.

The etching solution currently used at the Holmdel facility is the Philip A. Hunt Chemical Corporation's Endura-Etch. The spent solution is corrosive and contains ammonium hydroxide, ammonium chloride, and copper. Periodically the spent etching solution is shipped with the proper documentation back to the Philip A. Hunt Chemical Corporation, where it is recycled.

The paint thinner utilized at the Holmdel facility is 100 percent odorless mineral spirits. Periodically the waste paint thinner is shipped with the necessary documentation for offsite disposal.

The small container storage area receives small amounts of waste chemicals from miscellaneous laboratory operations within the Holmdel facility. These materials are identified by the laboratory occupants prior to removal to the small container storage area.

Periodically (approximately once per month) the waste materials within the small container storage area are packaged (lab packed) by an outside contractor and transported off site for treatment or disposal.

2.0 CHEMICAL AND PHYSICAL ANALYSES

The analytical results of samples taken from the concentrated waste storage tank are included in Section 4.0, Waste Analysis Plan. The test methods for analysis are listed in Table 4-2.

The materials that are stored in the small container storage area are identified by the user in the laboratory by an unwanted chemical removal tag. This is shown in Figure 2-1. These materials are not routinely analyzed.

The paint thinner in the drums is already identified by the user in the laboratory by an unwanted chemical removal tag. This waste is also not routinely analyzed.

The spend etchant is also identified in the laboratory by the user by an unwanted chemical removal tag so that the etchant can be taken by porters in the drums. These drums are shipped back to the Philip A. Hunt Chemical Corporation where the etchant is beneficially recycled. The waste is not analyzed at Holmdel.

3.0 PROCESS WASTE STORAGE DESCRIPTION

The raw materials arrive at the facility in drums and bottles, and are used in the laboratories for research and development purposes. The spent materials are defined as hazardous waste by the Resource Conservation and Recovery Act (RCRA). Since AT&T stores the waste for periods longer than 90 days, it is considered to be a hazardous waste facility. Figure 3-1 is a flow schematic of the process waste storage facility.

As mentioned in the general facility description, the entire storage operation consists of the concentrated waste storage tank, the drum storage area which comprises approximately 560 square feet and would contain an estimated maximum volume of 550 gallons, and the small container storage area comprised of the two masonry block rooms and the flammable liquid storage cabinet. The estimated maximum volume of the waste stored in the small container storage area is 25 gallons. All waste is identified in the laboratories by the users and taken by porters to the storage area. The waste is taken by the porters in bottles and small containers.

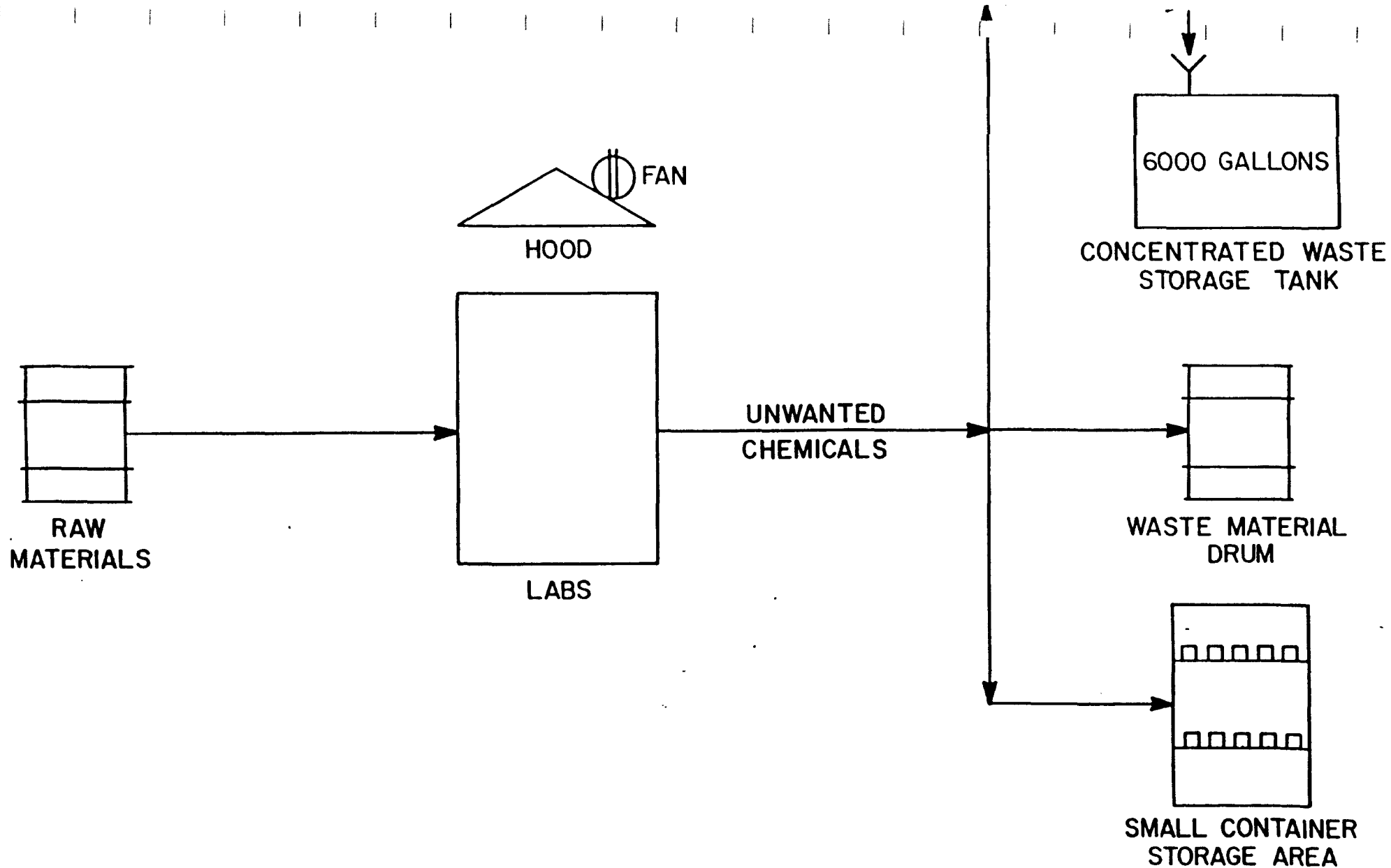
Concentrated Waste Storage Tank

Wastes that primarily include acetone, methanol, trichloroethane, and trichloroethylene are poured manually into the tank through the fill pipe. These wastes are periodically removed by an approved transporter to an approved facility. Approximately 5,000 gallons are removed once per year.

Drummed Waste

Drummed wastes are identified in the laboratories as being either spent etching solution or waste solvent.

The drums of spent etching solution are periodically shipped back to the Philip A. Hunt Chemical Corporation. Approximately thirty 55-gallon drums are removed per year. The drums are removed ten at a time during different periods during the year.



CDM

environmental engineers, scientists,
planners & management consultants

AT+T BELL LABORATORIES
HOLMDEL FACILITY

FIGURE 3-1
FLOW SCHEMATIC
HAZARDOUS WASTE STORAGE FACILITY

The drums of waste solvent that are predominantly paint thinner are periodically removed by an approved transporter to an approved facility. Approximately seven 55-gallon drums are removed twice per year.

Small Container Storage

The components of the waste in the small container storage area are identified in the laboratories. Periodically, the waste materials within the small container storage area are packaged by an outside contractor and transported off site for treatment or disposal. Approximately six lab-packed 55-gallon drums are removed per month.

REFERENCE NO. 11



13 JCS
13-18-06 Shotwell

State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT
John J. Treia, Ph.D., Acting Director
CN 028
Trenton, N.J. 08625
609 - 292 - 1250

Paul E. Wyszowski, P.E.
Group Supervisor,
Environmental Management Group
AT&T Bell Laboratories
600 Mountain Avenue
Murray Hill, N.J. 07974

22 SEP 1986

Dear Mr. Wyszowski:

RE: Hazardous Waste Facility Part B Permit Application for AT&T Bell Laboratories (Holmdel Site), Holmdel, Monmouth County, EPA ID No. NJD 011 328 887

The Bureau of Hazardous Waste Engineering has completed a preliminary review of your company's Hazardous Waste Facility Part B permit application submittal of May 30, 1986.

Review of the application has revealed that certain items necessary to complete the application have not been submitted.

Enclosed please find a Hazardous Waste Facilities checklist and comment sheet which indicate what information had been found missing in your company's submittal. Items marked "no" on the checklist are application requirements which have been found deficient. The comment sheet explains the deficiencies in these items.

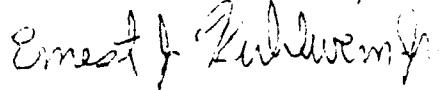
Your company shall submit the additional information required to correct these deficiencies within thirty (30) days from the date of this letter. Failure to submit a timely and complete response could be cause for enforcement action and initiation of denial procedures.

The above requested information should be prepared as an addendum to the application of record. Your response to this letter should be submitted to the Bureau in triplicate. After your application is considered administratively complete, you will be notified of the number of additional copies of the entire complete application your company will be required to submit for distribution by this Bureau to other State agencies and your local county and municipal offices.

22 SEP 1986

If there are any questions about this matter, please call Bob Patel of my staff at (609) 292-9880.

Very truly yours,



Ernest J. Kuhlwein, Jr., Acting Chief
Bureau of Hazardous Waste Engineering

EP9/sg

Enc.

c: Angel Chang,
USEPA, Region II

HAZARDOUS WASTE FACILITIES CHECKLIST

Applicant: AT&T Bell Laboratories (Holmdel Site)

Application for: X Part A. X Part B

Facility Type: Storage

Part A

Yes No N/A*

X Activities conducted by the applicant.

X Name, mailing address and location of the facility.

X Name, address, and telephone number of the owner(s) of the facility.

 X Up to four Standard Industrial Classification (SIC) codes which best reflect the principal products or services provided by the facility.

X Operator's name, address, telephone number, ownership status and status as a Federal, State, private, public or other entity.

 X Facility located on Indian lands.

 refer to item 1
X Permits or construction approvals received or applied for according to N.J.A.C. 7:26-12.2(d)7.

X Topographic map according to N.J.A.C. 7:26-12.2(d)8.

X Brief description of the nature of the business.

X Latitude and longitude of the facility.

X Indication if the facility is new or existing and whether it is a first or revised application.

X For existing facilities, a scale drawing of the facility according to N.J.A.C. 7:26-12.2(d)12.

 X refer to item 2
 For existing facilities, photograph of the facilities according to N.J.A.C. 7:26-12.2(d)13.

Inadequate refer to
items 3 X Types of hazardous waste listed or designated under N.J.A.C. 7:26-8.1 et seq. to be treated, stored or disposed annually.

X Estimate of the quantity of wastes to be treated, stored or disposed annually.

X General description of the process.

*N/A - Not Applicable

Part B

Yes No N/A*

X

General description of the facility and how it will operate to accept, treat, store and dispose of hazardous waste.

Inadequate
refer X to item 4

Waste analysis plan.

 X

Chemical and physical analysis of hazardous waste to be handled at the facility.

X

Flow schematics, material balance, and general type of equipment to be used.

X

Description of the security procedures and equipment required by N.J.A.C. 7:26-9.4(h).

Inadequate
X
refer to items 5

Copy of the general inspection schedule required by N.J.A.C. 7:26-9.4(f) and 7:26-10.1 et seq.

X

Description of the preparedness and prevention procedures and equipment required by N.J.A.C. 7:26-9.6.

refer to items 6&7
 X

Contingency plan and emergency procedures required by N.J.A.C. 7:26-9.7.

X

Engineering designs according to N.J.A.C. 7:26-12.2(e)9.

refer to item
 X

Description of procedures, structures or equipment used at the facility according to N.J.A.C. 7:26-12.2(e)10.

X

Description of precautions to prevent ignition or reaction of ignitable, reactive, or incompatible wastes as required by N.J.A.C. 7:26-9.4(e).

X

Deed, lease, options, etc.

refer 9 to item
 X

Topographic map according to N.J.A.C. 7:26-12.2(e)13.

 X

Seismic activity information as per N.J.A.C. 7:26-12(e)1

X

Identification of whether the facility is located within 100 year flood plain according to N.J.A.C. 7:26-12.2(e)1

X

Closure plan.

 X

Post-closure plan.

X

For existing facilities, documentation that a notice has been placed in the deed or appropriate alternative instrument as required by N.J.A.C. 7:26-9.9(m).

X

The most recent closure cost estimate for the facility prepared in accordance with N.J.A.C. 7:26-9.10(d), plus a copy of the financial assurance mechanism adopted in compliance with N.J.A.C. 7:26-9.10(e).

Yes No N/A*

<u>x</u>	<u> </u>	<u> </u>	Copy of the insurance policy according to N.J.A.C. 7:26-12.2(e)20.
<u>X</u>	<u> </u>	<u> </u>	Disclosure Statement.
<u> </u>	<u> </u>	<u>X</u>	Environmental and Health Impact Statement (EHIS).
<u>X</u>	<u> </u>	<u> </u>	CP #1 form and supplement.
<u>X</u>	<u> </u>	<u> </u>	Application fee.
<u>X</u>	<u> </u>	<u> </u>	Engineering fee.
<u>X</u>	<u> </u>	<u> </u>	Plans, drawings and narrative reports signed and sealed by N.J.P.E.

Certification

Yes No

<u>X</u>	<u> </u>	Certificate of liability from the signing applicant according to N.J.A.C. 7:26-12.2(j).
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Additional information required for:

Facilities that store containers of hazardous waste

Yes No N/A*

<u>X</u>	<u> </u>	<u> </u>	Description of the containment system according to N.J.A.C. 7:26-12.2(f)1i.
<u>X</u>	<u> </u>	<u> </u>	Sketches, drawings or data demonstrating compliance with N.J.A.C. 7:26-9.4(d).

Facilities that use tanks to store or treat hazardous waste

Yes No N/A*

<u> </u>	<u>X</u>	<u>refer to items 10</u>	Design standards or other available information of the tank.
<u> </u>	<u>X</u>	<u>refer to item 11</u>	Tank dimensions, capacity and shell thickness.
<u>X</u>	<u> </u>	<u> </u>	Diagram of piping, instrumentation and process flow.
<u> </u>	<u>X</u>	<u>refer to item 12</u>	Description of feed system, safety cutoff, by-pass systems and pressure controls.
<u>X</u>	<u> </u>	<u> </u>	Description of procedures for handling incompatible ignitable, or reactive waste, including the use of buffer zone.

Facilities that store or treat hazardous waste in surface impoundments

Yes	No	N/A*	
—	—	<u>X</u>	Statement indicating minimum freeboard according to N.J.A.C. 7:26-10.6. For flow through facilities a hydraulic profile shall be included.
—	—	<u>X</u>	Detailed drawings of the structure which will be provided to stop the flow into the impoundment.
—	—	<u>X</u>	Detailed drawings of any dikes.
—	—	<u>X</u>	Detailed designs, drawings and specifications of the liner(s) and the leachate detection, collection and removal system.
—	—	<u>X</u>	Liner installation instructions. For existing facilities a description of the installation procedures used.
—	—	<u>X</u>	Description of the maintenance and repair procedures proposed to comply with N.J.A.C. 7:26-10.6(c)4 and 7:26-9.4(f).
—	—	<u>X</u>	Description of the operating procedures according to 7:26-10.6(j), (k) and (l).
—	—	<u>X</u>	Site geology according to N.J.A.C. 7:26-12.2(f)3xii.

Facilities that incinerate hazardous waste

Yes	No	N/A*	
—	—	<u>X</u>	Submission of all requirements of a Trial Burn Plan according to N.J.A.C. 7:26-12.9(b).
—	—	<u>X</u>	Submission of results of trial burn according to N.J.A.C. 7:26-12.2(f)4i.
—	—	<u>X</u>	Submission of results of comparable incinerator data according to N.J.A.C. 7:26-12.2(f)4ii and iii.

Other information: soil sampling and analysis plan refer to item 13

Comment Sheet

Facility Name: AT&T Bell Laboratories (Holmdel Site) EPA ID No. NJD
011 328 887

1. Provide a copy of the Air Pollution Permit for the storage of waste solvents in the tank or a statement from the Bureau of Air Pollution Operations declaring that such permit is unnecessary.
2. Provide photographs of the hazardous waste storage in containers areas and hazardous waste storage in tank area as required under N.J.A.C. 7:26-12-2 (d)13.

- 3a. An updated NJDEP part A application is required, listing correct current NJDEP hazardous waste numbers and estimated annual quantities for each individual wastes to be stored in containers and the tank. There is no waste ID number listed for waste oil in the part A application.

The page 3 of the part A application lists quantities of groups of hazardous waste and not that of individual wastes.

- 3b. Identify the location from which the waste types D001, D002, F001, and F005 (estimated 300 pounds of each waste type) are to be received from off-site. Also, explain why the company wants to receive these waste types at the Holmdel Site.
4. The waste analysis plan included in the part B does not address the following requirements:
 - a. Chemical and physical properties of each waste
 - b. Equipment and procedure for collecting representative grab samples for waste streams.
 - c. Frequency of a detailed analysis of waste streams. A detailed analysis of each waste is also required.
 - d. Identify the methods of quality assurance and quality control to address all of the technical aspects of the waste analysis plan.
5. Documentation of an updated inspection schedule in the facility general inspection plan is required. The updated schedule should include the following additional items.
 - a. Inspection and frequency for labeling of containers, sealing of containers, condition of container, condition of the storage pad, valve operation position for drainage system and adequate operational condition of shower and eye wash system.
 - b. Inspection and frequency for waste loading pad drain, base of the pit for visible cracks, piping and valve, sump pump, ladder and platform condition in the hazardous waste storage in tank area.
6. Documentation demonstrating coordination agreements with hospitals is required according to N.J.A.C. 7:26-9.6(f).

REFERENCE NO. 12



AT&T

Bell Laboratories

13-18-04 INSPECTION REPORT

REPORT PREPARED FOR:

- ☒ Generator
- ☐ Transporter
- ☒ HWM (TSD) Facility

David J. Cesareo, P.E.
Environmental
Management Specialist

600 Mountain Avenue
Murray Hill, NJ 07974
Phone (201) 582-8880

898-1375
999-7923

FACILITY INFORMATION

Name: AT&T Bell Laboratories

Address: Crawford Corner Road
Holmdel

Lot: _____ Block: _____

County: Monmouth

Phone: 1-201-949-2311

EPA ID #: NJ D011328887

Date of Inspection: Sept. 26, 1986

PARTICIPATING PERSONNEL

State or EPA Personnel: William Zavacky

Facility Personnel: George Bogdan Senior Plant Engineer
David J. Cesareo Env. Management Spec.

Report Prepared by Name: William Zavacky

Region: Central

Telephone #: 609-298-1513

Reviewed by: Linda Z. Jordan

Date of Review: 9-29-86

FACILITY NAME: AT&T BELL Laboratories

ADDRESS: Crawford Corner Rd
Holmdel

TIME IN: _____

COUNTY: Monmouth

TIME OUT: _____

EPA ID : NJ D011328887

DATE OF INSPECTION: Sept. 26, 1986

PHOTOS TAKEN ☐ YES ☒ NO

If yes, how many? _____

SAMPLE TAKEN ☐ YES ☒ NO NO. OF SAMPLES _____

NJDEP ID # _____

MANIFESTS REVIEWED ☒ YES ☐ NO

Number of manifests in compliance Reviewed 22 manifest. For the year 1986.
Previous manifest were reviewed during 85 RUPA.

Number of manifests not in compliance _____

List manifest document numbers of those manifests not in compliance.

Describe the activities that result in the generation of hazardous waste.

- 1) Research and Development Labs.
- 2) Vehicle maintenance

Identify the hazardous waste located on site, and estimate the approximate quantities of each.
(Identify Waste Codes)

- (1) Drum (fifty five gallon) Trichloroethane III Fec 1
- (2) Drum (fifty five gallon) Flammable Liquid Dcc 1
- (1) Drum (fifty five gallon) Cleaning Liquid UG 80
- (3) Drum (fifty five gallon) Ammonium Hydroxide solution Dcc 2

SUMMARY OF FINDINGS

FACILITY DESCRIPTION AND OPERATIONS

This facility is located at Crawford Corner Road in Helmsland Township, Monmouth County, New Jersey. The facility consists of a large main building surrounded by several small buildings situated on approximately 300 acres. The facility consists of laboratories and offices employing approximately 6,500 employees who perform communication related research. The building was built in 1960 and has 2,000,000 sq. feet of space.

The hazardous waste facilities at this site are situated at two locations on the site:

(1) A 6,000 gallon concentrated waste storage tank is constructed of lined steel and located below grade within a concrete vault. Adjacent to this tank is a diked concrete slab where the liquid waste in drums is stored.

(2) A small container storage area is located within the laboratory wastewater treatment facility; the area consists of two masonry block rooms and one flammable liquid storage cabinet. In the same area but outside the building waste oil is stored in a 10 x 10 metal shed with 4" curbing for containment.

The tank vault is constructed of concrete, has inside dimensions of 11 feet by 21 feet by 12 1/2 feet deep and

SUMMARY OF FINDINGS

FACILITY DESCRIPTION AND OPERATIONS

has a wall thickness of 14 inches. The vault has both an internal and external coating, and is equipped with a sump pump and a ventilation system. A steel grating is located above the tank at the top of the vault. A woodframed up-halt shingled roof covers the tank and vault.

The waste storage tank receives small quantities of miscellaneous liquid waste from research and development laboratories ~~the~~ within the main building. These wastes are fed into the tank through a manual pouring station. The majority of the wastes that are poured into the tank are miscellaneous solvents which primarily include acetone, methanol, trichloroethane and trichloroethylene.

The drum storage area is comprised of a 14 foot by 39 foot concrete pad with 6 inch curbing on three sides. The pad slopes away from the noncurbed side toward a collection drain. This drain is connected to the concentrated waste storage tank. The drums in this area are stored on wooden pallets. The material that is stored in this area is spent etching solution and waste paint thinner.

The small container storage area receives small amounts of waste chemicals from miscellaneous laboratory

SUMMARY OF FINDINGSFACILITY DESCRIPTION AND OPERATIONS

operations within the facility. These materials are identified by the laboratory occupants prior to removal to the small container storage area.

Waste oil is generated from servicing vacuum pumps, air compressors and vehicle servicing.

The hazardous waste inventory at the facility is controlled by computer, everything put into the tank is logged. Waste is removed from the facility by registered collector haulers and it is manifested.

GENERATOR INSPECTION CHECKLIST

		YES	NO	N/A
7:26-8.5	<u>Hazardous waste determination</u>			
	(a) Did the generator test its waste to determine whether it is hazardous?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	Is the waste hazardous?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-8.5(b)2	Is the generator determining that its waste exhibits a hazardous waste characteristic(s) based on its knowledge of the material(s) or processes used? <i>Knew Leidge</i>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	Has hazardous waste been shipped off site since November 19, 1980?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If yes, how many shipments, off site, have been made and describe the approximate size of an average shipment made on a monthly basis. If facility is a small quantity generator, please explain.			
	<i>22 shipments For 1986</i>			
7:26-7.4(a)1	Does the generator have an EPA ID #?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)4	Does each manifest have the following information? Please circle the elements missing and obtain a copy of the incomplete manifests. (List those manifests that are deficient)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)4i	The generator's name, address and phone number?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)4ii	The generator's EPA ID number?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)4iii	The transporter(s) name, address and phone number?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)4iv	The transporter(s) EPA ID number?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)4v	The name, address and phone number of the designated TSD facility?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)4vi	The TSDF's EPA ID number?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)4vii	The name, type and quantity of hazardous waste being shipped, including such particulars as may be required regarding same?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-7.4(a)4viii	Special handling instructions and any other information required on the form to be shipped by the generator?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)5	Before allowing the manifested waste to leave the generator's property, did the generator:			
7:26-7.4(a)5i	Sign the manifest certification by hand?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)5ii	Obtain the handwritten signature of the initial transporter and date of acceptance on the manifest?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)5iii	Retain one copy and forward one copy to the state of origin and one copy to the state of destination?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(a)5iv	Give remaining copies of the manifest form to the transporter?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(f)1	Has the generator maintained facility records for three (3) years? (Manifest(s), exception report(s) and waste analysis)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(h)1	Has the generator received signed copies of portion B (from the TSD facility) of all manifests for waste shipped off site more than 35 days ago?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.4(h)2	If not:			
	1. Did the generator contact the hauler and/or the owner or operator of the TSDF and the NJDEP at 609-292-9877 to inform the NJDEP of the situation, and	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	2. Have exception reports been submitted to the Department covering any of these shipments made more than 45 days ago?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	Before transporting or offering hazardous waste for transportation off site, does the generator?			
7:26-7.2(a)	Conspicuously label appropriate manifest numbers on all hazardous waste containers that are intended for shipment?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-7.2(b)	Insure that all containers used to transport hazardous waste off site are in conformance with applicable DOT regulations (i.e., 49 CFR 171 - 49 CFR 179)?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

YES NO N/A

7:26-9.3

Accumulation time

How is waste accumulated on site?

- ☒ Containers
- ☒ Tanks (complete HWMF checklist)
- ☒ Aboveground ☐ Below ground
- ☐ Surface impoundments (complete HWMF checklist)
- ☐ Piles (complete HWMF checklist)

7:26-9.3(a)3

Is each container clearly dated with each period of accumulation so as to be visible for inspection?

___ ___ ✓

7:26-9.3(a)1

Is waste accumulated for more than 90 days?

✓ ___ ___

If yes, complete HWMF checklist.

STOP HERE IF THE HAZARDOUS WASTE MANAGEMENT FACILITY (TSD) CHECKLIST IS FILLED OUT.

SHORT TERM ACCUMULATION STANDARDS (FOR GENERATORS WHO ACCUMULATE WASTE IN CONTAINERS FOR 90 DAYS OR LESS)

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4	<u>Containers</u>			
	What type of containers are used for storage. Describe the size, type and quantity and nature of waste (e.g., 12 fifty five gallon drums of waste acetone).			
7:26-9.4(d)1i	Do the containers appear to be in good condition, not in danger of leaking?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	If no, please describe the type, condition and number of leaking or corroded containers. Be detailed and specific.			
7:26-9.4(d)4i	Are all containers securely closed except those in use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)4iii	Do containers appear to be properly handled or stored in a manner which will minimize the risk of the container rupturing or leaking?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)4iv	Are containerized hazardous waste segregated in storage by waste type?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)4v	Is every container arranged so that its identification label is visible?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)5	Is the storage area inspected at least daily?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)6	Are containers holding ignitable and reactive wastes located at least 50 feet (15 meters) from the facility's property line?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-11.2	<u>Tanks</u>			
7:26-12.1(a)	Does the generator store hazardous waste in tanks?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	If yes, what are the approximate number and size of tanks containing hazardous waste?			

Identify the waste treated/stored in each tank.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
	<u>General Operating Requirements</u>			
7:26-11.2(a)2	Are the tanks maintained so that there is no evidence of past, present, or risk of future leaks?	---	---	✓
	If no, please explain.			
	Are there leaking tanks?	---	---	---
7:26-11.2(a)2	Are all hazardous wastes or treatment reagents being placed in tanks compatible with the tank material so that there is no danger or ruptures, corrosion, leaks or other failures?	---	---	---
7:26-11.2(3)	Do uncovered tanks have at least 2 feet of freeboard or an adequate containment structure?	---	---	---
7:26-11.2(a)4	If waste is continuously fed into a tank, is the tank equipped with a means to stop the inflow from the tank, e.g., bypass system to a standby tank?	---	---	---
7:26-11.2(d)	<u>Inspections</u>			
	Is the tank(s) inspected each operating day for:			
	1. Discharge control equipment	---	---	---
	2. Monitoring equipment	---	---	---
	3. Level of waste in tank	---	---	---
	4. Construction of materials of the tank	---	---	---
	5. Are the tanks and surrounding areas (e.g., dike) inspected weekly for leaks, corrosion or other failures?	---	---	---
7:26-9.2(b)	Are there underground tanks used to store hazardous waste?	---	---	---
	If yes, how many and can they be entered for inspection?	---	---	---
7:26-11.2(e)	Are ignitable or reactive wastes stored in a manner which protects them from a source of ignition or reaction?	---	---	✓
	If no, please explain.			

		YES	NO	N/A
7:26-11.2(f)	Does it appear that incompatible wastes are being stored separate from each other?	_____	_____	<u>✓</u>
7:26-9.4(g)4	<u>Personnel training</u> Have facility personnel successfully completed a program of classroom instruction or on-the-job training since six months after the date of their employment or assignment to the facility or to a new position at the facility?	_____	_____	_____
7:26-9.4(g)2	Is the program directed by a person trained in hazardous waste management procedures and does it include instruction which teaches facility personnel hazardous waste management procedures (including contingency plan implementation) relevant to the positions in which they are employed?	_____	_____	_____
7:26-9.4(g)5	If yes, have facility personnel taken part in an annual review of the initial training? Is there written documentation of the following:	_____	_____	_____
7:26-9.4(g)6i	Job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job?	_____	_____	_____
7:26-9.4(g)6ii	A written job description for each position related to hazardous waste management?	_____	_____	_____
7:26-9.4(g)6iii	A written description of the type and amount of both introductory and continuing training that has been and will be given to personnel in jobs related to hazardous waste management?	_____	_____	_____
7:26-9.4(g)6iv	Documentation of actual training or experience received by personnel?	_____	_____	_____
7:26-9.4(g)7	Are training records kept on all current employees until closure of the facility and training records kept on former employees for three years from their last date of employment?	_____	_____	_____
7:26-9.4(g)8	Are semi-annual drills conducted involving all employees and appropriate local authorities to test emergency response capabilities at the facility in accordance with the contingency plan and emergency procedures development pursuant to NJAC 7:26-9.7?	_____	_____	<u>✓</u>

YES NO N/A

7:26-9.6

Preparedness and prevention

Does the facility comply with preparedness
and prevention requirements including
maintaining:

✓

		YES	NO	N/A
7:26-9.6(b)1	An internal communications or alarm system?	—	—	✓
7:26-9.6(b)2	A telephone or other device to summon emergency assistance from local authorities?	—	—	—
7:26-9.6(b)3	Portable fire equipment, spill control equipment, and decontamination equipment?	—	—	—
7:26-9.6(b)4	Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems?	—	—	—
7:26-9.6(c)	Is equipment tested and maintained?	—	—	—
7:26-9.6(d)1	Is there immediate access to communications or alarm systems during handling of hazardous waste?	—	—	—
7:26-9.6(e)	Adequate aisle space to allow unobstructed movement of personnel fire protection equipment, spill control equipment and decontamination equipment?	—	—	—
	If no, please explain.			
	In your opinion, do the types of waste on site require all of the above procedures, or are some not required?	—	—	—
	Explain.			
7:26-9.6(f)	Has the facility made the following arrangements, as appropriate for the type of waste handled on site:	—	—	—
7:26-9.6(f)1	Familiarize police, fire departments and emergency response teams with the layout of the facility and hazardous waste handled?	—	—	—
7:26-9.6(f)2	Where more than one police and fire department might respond to an emergency, is there an agreement designating primary emergency authority to a specific police or fire department, and agreements with any others to provide support to the primary emergency authority?	—	—	✓

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.6(f)3	Agreements with emergency response contractors, and equipment suppliers?	—	—	✓
7:26-9.6(f)4	Arrangements to familiarize local hospitals with the properties of hazardous waste handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or discharges at the facility?	—	—	—
7:26-9.6(f)5	Arrangements with local fire departments to inspect the facility on a regular basis with at least two (2) inspections annually?	—	—	—
7:26-9.7	<u>Contingency plan and emergency procedures</u>			
7:26-9.7(a)	Does the facility have a written contingency plan for emergency procedures designed to deal with fires, explosions, hazards to human health or environment, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil or surface water?	—	—	—
7:26-9.7(b)	Are provisions of the plan carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment?	—	—	—
7:26-9.7(c)	Does the contingency plan describe the actions facility personnel shall take in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility?	—	—	—
7:26-9.7(d)	Did the owner or operator prepare a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112 or 151 or a Discharge Prevention, Containment and Countermeasure (DPCC) Plan in accordance with N.J.A.C. 7:1E-4.1 <u>et seq.</u> ?	—	—	—
	If yes, did the owner or operator amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of this section?	—	—	—
7:26-9.7(e)	Does the plan describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and State and local emergency response teams to coordinate emergency services?	—	—	✓

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.7(f)	Does the plan list names, addresses, and phone numbers (office and home) of all persons qualified to act as emergency coordinator and is this list kept up to date? Where more than one person is listed, one shall be named as primary emergency coordinator and others shall be listed in the order in which they will assume responsibility as alternates.	—	—	
7:26-9.7(g)	Does the plan include a list of all emergency equipment at the facility (such as fire extinguishing systems, spill control equipment, communications and alarm systems (internal and external), and decontamination equipment), where this equipment is required? Is the list kept up-to-date? In addition, does the plan include the location and a physical description of each item on the list, and a brief outline of its capabilities?	—	—	—
7:26-9.7(h)	Does the plan include an evacuation procedure for facility personnel where there is a possibility that evacuation could be necessary? Does this plan describe signal(s) to be used to begin evacuation, evacuation routes, and alternative evacuation routes (in cases where the primary routes could be blocked by releases of hazardous waste or fires)?	—	—	—
7:26-9.7(i)	Is a copy of the contingency plan and all revisions to the plan:			
	1. Maintained at the facility; and	—	—	—
	2. Has the contingency plan been submitted to local authorities (police fire departments, emergency response teams)?	—	—	✓

TRANSPORTER INSPECTION

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
	Does the transporter carry hazardous waste? If yes, explain.	—	—	<u>✓</u>
7:26-7.5(c)1	Has the transporter obtained a hazardous waste collector/hauler license from the NJDEP? License #:	—	—	—
7:26-7.5(d)1	Does the transporter have an EPA identification number?	—	—	—
7:26-3.4(h)	Do the vehicle(s) have the NJSWA registration number in letters and numbers at least three (3) inches in height?	—	—	—
7:26-3.4(h)	Is the capacity of the vehicle marked on both sides of the vehicle in letters and numbers at least three (3) inches in height?	—	—	—
7:26-3.4(h)	Is the current NJSWA registration certificate in the vehicle?	—	—	—
7:26-3.2(b)	Does the license plate number and registration number on the certificate correspond to the vehicle's license plate number and the registration number displayed on the vehicle?	—	—	—
7:26-7.5(d)18	Does the transporter have in each registered vehicle a current list of all federal and state agencies to be notified in the event of a discharge of hazardous waste during transportation?	—	—	—
	How many vehicles were inspected?			
7:26-7.5(d)12	Have the drivers received any instruction or training to do with the handling of hazardous waste?	—	—	—
7:26-7.5(d)15	Is the transporter equipped with emergency equipment in conformance with subpart H of 49 CFR 393? List equipment.	—	—	—

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-7.5(f)1i to iv	Has the transporter ever had an unauthorized discharge of hazardous waste during transportation?	—	—	—
	If yes, did the transporter:			
7:26-7.5(f)3i	Give notice, if required by 49 CFR 171.15 to the National Response Center?	—	—	—
7:26-7.5(f)3ii	Report in writing as required by 49 CFR 171.16 to the Director, Office of Hazardous Materials, Transportation Bureau, Department of Transportation, Washington, DC 20590?	—	—	—
7:26-7.5(f)3iii	Contact the Department at 609-292-5560 or 609-292-7172?	—	—	—

MANIFESTS

7:26-7.5(d)5	Does the transporter have a manifest form to accompany the waste shipment?	—	—	—
	Manifest document number: _____			
7:26-7.3(a)1	If the shipment originated from a site in New Jersey and is destined for another site in New Jersey, is the manifest form one supplied by the NJDEP?	—	—	—
7:26-7.3(a)2	If the shipment originated from a site in another state and is destined for a TSDF in New Jersey, is the manifest form one supplied by the NJDEP or one approved for use in New Jersey by the Department?	—	—	—
7:26-7.3(a)3	If the shipment originated from a site in New Jersey and is destined for a TSDF in another state, is the manifest form one supplied by the NJDEP or one approved for use by the Department?	—	—	—
7:26-7.5(d)11	If the hauler was unable to deliver a manifested load to the designated facility, did they contact the generator and gain further instructions from them?	—	—	—
	If yes, cite generator name and manifest number involved.			

HAZARDOUS WASTE FACILITY STANDARDS

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(b)	<u>Waste Analysis</u>			
7:26-9.4(b)1i	Is there a detailed chemical and physical analysis of a representative sample of the waste(s) or each waste? (At a minimum, this analysis must contain all the information necessary for proper treatment, storage or disposal of the waste.)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(b)1iii	Does the character of the waste handled at the facility change from day to day, week to week, etc., thus requiring frequent testing? Check only one: Waste characteristics vary All waste(s) are basically the same <u> </u> Company treats all waste(s) as hazardous <u> </u>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(b)2	Is there a written waste analysis plan at the facility?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	Does it contain:			
7:26-9.4(2)i	Parameters for which each hazardous waste stream will be analyzed including constituents listed in NJAC 7:26-8.16 and the rationale for the selection of these parameters?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(b)2ii	The test methods which will be used to test for these parameters?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(b)2iii	The sampling method which will be used to obtain a representative sample of the waste to be analyzed?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(b)2iv	The frequency with which the initial analysis of the waste will be reviewed or repeated to ensure that the analysis is accurate and up-to-date?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(b)2v	For off-site facilities, the waste analysis that hazardous waste generators have agreed to supply?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(b)2vii	Procedures which will be used to identify changes in waste stream characteristics?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(b)3	Did the owner or operator submit the waste analysis plan to the Department?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

If yes, when was the plan submitted?

with Part (B)

YES NO N/A

Does hazardous waste come to this facility from an outside source? (e.g., another generator)

— ✓ —

If yes, list the name(s) of generators.

7:26-9.4(b)4

If waste comes from an outside source, are there procedures in the waste analysis plan to insure that waste received conforms to the accompanying manifest?

— — ✓

Does the plan describe:

7:26-9.4(b)4i

The procedures which will be used to determine the identity of each shipment of waste managed at the facility?

— — ✓

7:26-9.4(b)4ii

The sampling method which will be used to obtain a representative sample of the waste to be identified, if the identification method includes sampling?

— — ✓

7:7:26-9.4(h)

Security

Does the facility have:

7:26-9.4(h)1i

A 24 hour surveillance system which continuously monitors and controls entry onto the active portion of the facility? *Guard Service*

✓ — —

7:26-9.4(h)1ii

An artificial or natural barrier, which completely surrounds the active portion of the facility; and a means to control entry, at all times, through the gates or other entrances to the active portion of the facility?

✓ — —

7:26-9.4(h)3

Are there "Danger-Unauthorized Personnel Keep Out" signs posted at each entrance to the facility?

✓ — —

If no, explain what measures are taken for security.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(f)	<u>General Inspection Requirements</u>			
7:26-9.4(f)1	Does the owner or operator inspect the facility for malfunctions and deterioration, operator errors and discharges which may be causing, or may lead to:			
7:26-9.4(f)1i	Discharge of hazardous waste constituents to the environment?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(f)1ii	A threat to human health?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(f)3	Has the owner or operator developed, and does the owner or operator follow a written schedule for inspecting monitoring equipment, safety and emergency equipment, security devices, and operating and structural equipment that are utilized for the prevention, detection or response to environmental or human health?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(f)3i	Did the owner or operator submit the written inspection schedule to the department?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If yes, when was it submitted?			
	<i>part (b)</i>			
7:26-9.4(f)3iii	Is the written inspection schedule kept at the facility?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(f)3iv	Does the schedule identify the types of problems to be looked for during the inspection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(f)3v	Does the schedule include the frequency of inspection, based upon the rate of possible deterioration of the equipment and the probability of an environmental, or human health incident if the deterioration or malfunctions or any operator error goes undetected between inspections?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(f)5	Is there evidence that problems reported in the inspection log have been remedied?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(f)6	Does the owner/operator record inspections in a log?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	Are these records kept for at least three (3) years from the date of inspection?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

YES NO N/A

Does the records include the date, and time of the inspection, the name of the inspector, a notation of the observations made, and the date and nature of any repairs or other remedial action?

☒ ☐ ☐

7:26-9.4(g)

Personnel training

Have facility personnel successfully completed a program of classroom instruction or on-the-job training within 6 months of having been employed?

☒ ☐ ☐

7:26-9.4(g)2

Is the program directed by a person trained in hazardous waste management procedures and does it include instruction which teaches facility personnel hazardous waste management procedures (including contingency plan implementation) relevant to the positions in which they are employed?

☒ ☐ ☐

7:26-9.4(g)5

If yes, have facility personnel taken part in an annual review of training?

☒ ☐ ☐

Is there written documentation of the following:

☒ ☐ ☐

7:26-9.4(g)6i

Job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job?

☒ ☐ ☐

7:26-9.4(g)6ii

A written job description for each position related to hazardous waste management?

☒ ☐ ☐

7:26-9.4(g)6iii

A written description of the type and amount of both introductory and continuing training given to personnel in jobs related to hazardous waste management?

☒ ☐ ☐

7:26-9.4(g)6iv

Documentation of actual training or experience received by personnel?

☒ ☐ ☐

7:26-9.4(g)7

Are training records kept on all current employees until closure of the facility and training records kept on former employees for 3 years from their last date of employment?

☒ ☐ ☐

7:26-9.4(g)8

Are semi-annual drills conducted involving all employees and appropriate local authorities to test emergency response capabilities at the facility in accordance with the contingency plan and emergency procedures development pursuant to NJAC 7:26-9.7?

☒ ☐ ☐

YES NO N/A

7:26-9.6 Preparedness and prevention

Does the facility comply with preparedness and prevention requirements including maintaining:

7:26-9.6(b)1 An internal communications or alarm system? ☒ ☐ ☐

7:26-9.6(b)2 A telephone or other device to summon emergency assistance from local authorities? ☒ ☐ ☐

7:26-9.6(b)3 Portable fire equipment, spill control equipment, and decontamination equipment? ☒ ☐ ☐

7:26-9.6(b)4 Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems? ☒ ☐ ☐

7:26-9.6(c) Is equipment tested and maintained? ☒ ☐ ☐

7:26-9.6(d)1 Is there immediate access to communications or alarm systems during handling of hazardous waste? ☒ ☐ ☐

7:26-9.6(e) Adequate aisle space to allow unobstructed movement of personnel fire protection equipment, spill control equipment and decontamination equipment? ☒ ☐ ☐

If no, please explain.

In your opinion, do the types of waste on site require all of the above procedures, or are some not required?

☒ ☐ ☐

Explain.

7:26-9.6(f) Has the facility made the following arrangements, as appropriate for the type of waste handled on site? ☒ ☐ ☐

7:26-9.6(f)1 Familiarize police, fire departments and emergency response teams with the layout of the facility and hazardous waste handled? ☒ ☐ ☐

		YES	NO	N/A
7:26-9.6(f)2	Where more than one police and fire department might respond to an emergency, is there an agreement designating primary emergency authority to a specific police or fire department, and agreements with any others to provide support to the primary emergency authority?	✓	—	—
7:26-9.6(f)3	Agreements with emergency response contractors, and equipment suppliers?	✓	—	—
7:26-9.6(f)4	Arrangements to familiarize local hospitals with the properties of hazardous waste handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or discharges at the facility?	✓	—	—
	<i>documented</i>			
7:26-9.6(f)5	Arrangements with local fire departments to inspect the facility on a regular basis with at least two (2) inspections annually?	✓	—	—
7:26-9.7	<i>Fac. has own Hospital with (2) doctors on duty Full Time.</i> <u>Contingency plan and emergency procedures</u>	✓	—	—
7:26-9.7(a)	Does the facility have a written contingency plan for emergency procedures designed to deal with fires, explosions, hazards to human health or environment, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil or surface water?	✓	—	—
7:26-9.7(b)	Are provisions of the plan carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment?	✓	—	—
7:26-9.7(c)	Does the contingency plan describe the actions facility personnel shall take in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility?	✓	—	—
7:26-9.7(d)	Did the owner or operator prepare a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112 or 151 or a Discharge Prevention, Containment and Countermeasure (DPCP) Plan in accordance with N.J.A.C. 7:1E-4.1 et seq.?	✓	—	—
	If yes, did the owner or operator amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of this section?	✓	—	—

7:26-9.7(e)	Does the plan describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and State and local emergency response teams to coordinate emergency services?	✓	—	—
7:26-9.7(f)	Does the plan list names, addresses, and phone numbers (office and home) of all persons qualified to act as emergency coordinator and is this list kept up-to-date? Where more than one person is listed, one shall be named as primary emergency coordinator and others shall assume responsibility as alternates.	✓	—	—
7:26-9.7(g)	Does the plan include a list of all emergency equipment at the facility (such as fire extinguishing systems, spill control equipment, communications and alarm systems (internal and external), and decontamination equipment), where this equipment is required? Is the list kept up-to-date? In addition, does the plan include the location and a physical description of each item on the list, and a brief outline of its capabilities?	✓	—	—
7:26-9.7(h)	Does the plan include an evacuation procedure for facility personnel where there is a possibility that evacuation could be necessary? Does this plan describe signal(s) to be used to begin evacuation, evacuation routes, and alternative evacuation routes (in cases where the primary routes could be blocked by releases of hazardous waste or fires)?	✓	—	—
7:26-9.7(i)	Is a copy of the contingency plan and all revisions to the plan: 1. Maintained at the facility; and 2. Has the contingency plan been submitted to local authorities (police, fire departments, emergency response teams)?	✓	—	—
7:26-9.8	<u>Closure plan</u>	Documented	—	—
7:26-9.8(c)	Does the facility have a written closure plan?	✓	—	—
	Does the owner/operator keep a written copy of the closure plan and all revisions to the plan at the facility?	✓	—	—
	If yes, does the plan include: with part (B)			

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.8(e)1i	A description of how and when the facility will be partially closed (if applicable) and ultimately closed?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.8(e)1ii	The maximum extent of the operation which will be open during the life of the facility?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.8(e)2	An estimate of the maximum inventory of wastes in storage or in treatment at any given time during the life of the facility?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.8(e)3	A description of the steps needed to decontaminate facility equipment during closure?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.8(e)4	A schedule for final closure including the anticipated date when the wastes will no longer be received, the date when completion of final closure is anticipated, and intervening milestone dates which will allow tracking of the progress of closure?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	<u>Post Closure Plan</u> <u>N/A</u>			
7:26-9.9(g)	Does the facility have a written post-closure plan kept at the facility?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If yes, does the plan:			
7:26-9.9(i)	Identify the activities which will be carried on after closure and the frequency of these activities?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.9(i)1	Include a description of the planned ground-water monitoring activities and frequencies at which they will be performed?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.9(i)2	Include a description of the planned maintenance activities, and frequency at which they will be performed, to insure the following:	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.9(i)2i	The integrity of the cap and final cover or other containment structures where applicable?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.9(i)2ii	Describe the function of the facility monitoring equipment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.9(i)3	Include the name, address and phone number of a person or office to contact about the disposal facility during the post-closure period?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	Does the owner/operator have a written estimate of the cost of post-closure for the facility?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If yes, what is it?			

Please circle all appropriate activities and answer questions on indicated pages for all activities circled.

<u>Storage</u>	<u>Treatment</u>	<u>Disposal</u>
Container - pg. 9	Tank - pg. 12	Landfill - pg. 18
Tank, above ground - pg. 12	Surface Impoundments - pg. 15	
Tank, below ground - pg. 12	Incineration - pg. 20	Surface Impoundments - pg. 15
Surface Impoundments - pg. 15	Thermal Treatment - pg. 23	Other _____
Waste Piles - pg. 17		
Other _____	Chemical, Physical and Biological Treatment - pg. 25	
	Other _____	

YES NO N/A

7:26-9.4(d)

Containers

What type of containers are used for storage?
Describe the size, type, quantity and nature of wastes (e.g., 12 fifty-five gallon drums of waste acetone)

1.) 55 Gal. Drums for waste solvents

2.) Lab packs for small chem containers, new material of fire spec.

7:26-10.4(b)

Is there a containment system for spills, leaks and precipitation?

✓ — —

Is yes, describe the containment system.

6" curbing in all storage areas

7:26-9.4(d)1i

Do the containers appear to be of sturdy leak-proof construction of adequate wall thickness, weld, hinge and seam strength, and of sufficient material strength to withstand side and bottom shock, while filled, without impairment of the container's ability to contain hazardous waste?

✓ — —

If no, explain.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(d)1ii	Are the lids, caps, hinges or other closure devices of sufficient strength that when closed, they will withstand dropping, overturning or other shock without impairment of the container's ability to contain hazardous waste?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(d)2	Do the containers appear to be in good condition, not in danger of leaking?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)2	If not, please describe the type, condition and number of leaking or corroded containers. Be detailed and specific.			
7:26-9.4(d)4i	Are all containers securely closed, except those in use, so that there is no escape of hazardous waste or its vapors?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(d)4iii	Do containers appear to be properly opened, handled or stored in a manner which will minimize the risk of the container rupturing or leaking?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(d)iv	Are containerized hazardous wastes segregated in storage by waste type?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)v	Are containerized hazardous wastes arranged so that their identification label is visible?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)3	Are hazardous wastes stored in containers made of compatible materials?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(d)5	Does the owner/operator inspect the container storage area at least daily, looking for leaks and for deterioration caused by corrosion or other factors?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)6	Are containers holding ignitable and reactive waste located at least 50 feet (15 meters) away from the facility's property line?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)7i	Are incompatible wastes, or incompatible wastes and materials placed in the same container? If yes, explain.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)7ii	Are hazardous wastes placed in unwashed containers that previously held incompatible wastes? If yes, explain.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)7iii	Are containers holding hazardous waste that are incompatible with any waste or other materials stored nearby in other containers, open tanks, or surface impoundments separated from the other materials or protected from them by means of a dike, berm, wall or other device?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)1i	Are ignitable, reactive or incompatible wastes protected from sources of ignition or reaction? If no, explain.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)1ii	Does the owner/operator confine smoking and open flames to specially designated locations when ignitable or reactive wastes are being handled? If no, explain.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

		YES	NO	N/A
7:26-9.4(e)1iii	Does the owner/operator conspicuously place "No Smoking" signs whenever there is a hazard from ignitable or reactive waste?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If the treatment, storage or disposal of ignitable or reactive waste, and the mixture of incompatible wastes and materials, conducted so that it does not:			
7:26-9.4(e)2i	Generate extreme heat or pressure, fire or explosion, or violent reaction?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)2ii	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)2iii	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)2iv	Damage the structural integrity of the device or facility containing the waste?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)2v	Threaten human health or the environment?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

7:26-11.2

Tanks

What are the approximate number and size of tanks containing hazardous waste?

6000 Gal. Tank in a vault in the ground that has no top. The tank is risable.

The vault has no top. - See description in summary.
Identify the waste treated/stored in each tank.

Mixed chemicals - non-chlorinated solvents

Each Lab sending waste to storage must identify the waste before it leaves the Lab.

General Operating Requirements

7:26-11.2(a)2	Are hazardous wastes or treatment reagents placed in the tank that could cause the tank or its inner liner to rupture, leak or corrode?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
	If yes, please explain.			
	Are there leaking tanks?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

		YES	NO	N/A
7:26-11.2(a)2	Are all hazardous wastes or treatment reagents being placed in tanks compatible with the tank material so that there is no danger of ruptures, corrosion, leaks or other failures?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-11.2(3)	Do uncovered tanks have at least 2 feet of freeboard or an adequate containment structure?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
7:26-11.2(a)4	If waste is continuously fed into a tank, is the tank equipped with a means to stop the inflow from the tank, e.g., bypass system to a standby tank?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
7:26-11.2(c)	<u>Inspections</u>			
	Is the tank(s) inspected for:			
	1. Discharge control equipment (each operating day)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	2. Monitoring equipment (each operating day)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	3. Level of waste in tank (each operating day)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	4. Construction of materials of the tank (weekly)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	5. Are the tanks and surrounding areas (e.g., dike) inspected weekly for leaks, corrosion or other failures (weekly)?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.2(b)	Are there underground tanks used to store hazardous waste?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	If yes, how many and can they be entered for inspection?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	Has the underground tank been in use on or before November 19, 1980? Specify date.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	If no, when was the tank placed in use?			
	<i>1971 - Steel Tank epoxy lined - inside a concrete vault. - sits on saddles - kept off bottom</i>			
7:26-11.2(e)	Are ignitable or reactive wastes stored in a manner which protects them from a source of ignition or reaction?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, please explain.			

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.2(f)	Does it appear that incompatible wastes are being stored separate from each other?	<u>✓</u>	<u>—</u>	<u>—</u>
7:26-9.2(b)3i	Does the facility have a groundwater monitoring plan approved by the Department?	<u>—</u>	<u>—</u>	<u>✓</u>
7:26-9.2(b)3ii	Is the use of the tank specified to the manufacturers recommended lifetime?	<u>—</u>	<u>—</u>	<u>✓</u>
7:26-10.5(e)6	Are the underground tanks subjected to periodic integrity testing?	<u>—</u>	<u>—</u>	<u>✓</u>

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:14A-6	<u>Groundwater monitoring</u> (Applies only to: surface impoundments, landfills, land disposal facilities)			
7:14A-6.2	Does the owner/operator have a groundwater monitoring plan approved by the Department and capable of determining the facility's impact on the quality of groundwater? If no, please explain. How many monitoring wells has the facility installed? What is the depth to groundwater? How many deep monitoring wells are onsite? (Indicate depth of monitoring wells) How many shallow monitoring wells are onsite? (Indicate depth of monitoring wells)	<u> </u>	<u> </u>	<u> </u>
7:14A-6.3(a)	Is the groundwater monitoring system capable of yielding groundwater samples for analysis? If no, please explain.	<u> </u>	<u> </u>	<u> </u>
7:14A-6.3(a)1	Are monitoring wells installed hydraulically upgradient? If yes, specify how many and the depth of each.	<u> </u>	<u> </u>	<u> </u> ✓

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:14A-6.3(a)2	How many monitoring wells are installed hydraulically down gradient?	___	___	___
	If yes, specify how many and the depth of each.			
7:14A-6.4(a)	Does the owner/operator have a groundwater sampling and analysis plan?	___	___	___
	If no, please explain.			
7:14A-6.4(a)	Does the plan include procedures and techniques for:			
	1. Sample collection	___	___	___
	2. Sample preservation and shipment	___	___	___
	3. Analytical procedures	___	___	___
	4. Chain of custody	___	___	___
7:26-11.3	<u>Surface Impoundments</u>			
	Describe the design and operating features of the surface impoundment to prevent groundwater contamination (e.g., liner leachate collection system).			
	Give the approximate size of surface impoundments (gallons or cubic feet). Please specify the types of waste stored and treated.			
7:26-11.3(a)	Is there at least 2 feet of freeboard in the impoundment?	___	___	___ V

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.3(b)	Do all earthen dikes have a protective cover to preserve their structural integrity?	—	—	—
	If yes, please specify the type of covering.			
7:26-9.4(b)1	Does the owner/operator have a detailed chemical and physical analysis of a representative sample of the waste in the impoundment?	—	—	—
7:26-9.4(c)2	Does the owner/operator place the results from each waste analysis and trial test, or the documented information, in the operating record of the facility?	—	—	—
7:26-11.3(d)	Does the owner or operator inspect:			
7:26-11.3(d)1	The freeboard level at least once each operating day to ensure compliance with subsection 11.3(a)?	—	—	—
7:26-11.3(d)2	The surface impoundment, including dikes and vegetation surrounding the dike, at least once a week to detect any leaks, deterioration or failures in the impoundment?	—	—	—
7:26-11.3(f)	Is ignitable or reactive waste placed in the surface impoundment?	—	—	—
7:26-11.3(f)1	If yes, is the waste treated, rendered, or mixed before or immediately after placement in the impoundment?	—	—	—
7:26-11.3(f)1i	Does the resulting waste, mixture, or dissolution of material no longer meet the definition of ignitable or reactive waste?	—	—	—
7:26-11.3(f)1ii	Is the waste treated, rendered or mixed so that it does not:			
7:26-9.4(e)2i	Generate extreme heat or pressure, fire or explosion, or violent reaction?	—	—	—
7:26-9.4(e)2ii	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	—	—	—
7:26-9.4(e)2iii	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	—	—	✓

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(e)2iv	Damage the structural integrity of the device or facility containing the waste?	—	—	—
7:26-9.4(e)2v	Threaten human health or the environment?	—	—	—
7:26-11.3(f)2	Is the surface impoundment used solely for emergencies?	—	—	—
7:26-11.3(g)	Are incompatible wastes, or incompatible wastes and materials placed in the same surface impoundment?	—	—	—
	If yes, is the waste managed so that it does not:			
7:26-9.4(e)2i	Generate extreme heat or pressure, fire or explosion, or violent reaction?	—	—	—
7:26-9.4(e)2ii	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	—	—	—
7:26-9.4(e)2iii	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	—	—	—
7:26-9.4(e)2iv	Damage the structural integrity of the device or facility containing the waste?	—	—	—
7:26-9.4(e)2v	Threaten human health or the environment?	—	—	—

Waste Piles

How many waste piles are on-site and approximately how large are they? (Please indicate size and height and types of wastes in piles.)

Is the waste pile protected from wind erosion? — — —

a) Does it appear to need such protection? — — —

b) Explain what type of protection does exist.

7:26-9.3(a)5i Is the waste pile larger than 200 cubic yards? — — ✓

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.3(a)5ii	Is the pile placed on an impermeable base that is compatible with the waste?	___	___	___

If no, explain.

7:26-9.3(a)5iii	Is run-on diverted away from the pile?	___	___	___
7:26-9.3(a)5iv	Is leachate and run-off from the pile collected and managed as a hazardous waste?	___	___	___

7:26-11.4 Landfills

Identify the types of waste and size of the landfill.

General Operating Requirements

7:26-11.4(a)1	Is run-on diverted away from all portions of the landfill?	___	___	___
7:26-11.4(a)2	Is run-off from active portions of the landfill collected?	___	___	___
7:26-11.4(a)3	Is waste which is subject to wind dispersal controlled?	___	___	___

Please explain how.

7:26-11.4(a)4	Does waste disposal or the disposal operation occur within 200 feet (60.6 meters) of the property boundary?	___	___	___
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7:26-11.4(a)6	Are untreated, ignitable, or reactive wastes placed in the landfill?	___	___	___ ✓
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If yes, explain.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.4(a)7	Are incompatible wastes, or incompatible wastes and materials placed in the same hazardous waste landfill cell?	—	—	—
	If yes, explain.			
7:26-11.4(a)8	Are bulk or non-containerized liquid waste or waste containing free liquids placed in a hazardous waste landfill?	—	—	—
	If yes:			
7:26-11.4(a)8i	Does the hazardous waste landfill have a liner which is chemically and physically resistant to the added liquid and a functioning leachate collection and removal system with a capacity sufficient to remove all leachate produced?	—	—	—
7:26-11.4(a)8ii	Before disposal, is the liquid waste or waste containing free liquids treated or stabilized, chemically or physically, so that free liquids are no longer present?	—	—	—
7:26-11.4(a)9	Are containers holding liquid waste or waste containing free liquids placed in a hazardous waste landfill?	—	—	—
	If yes:			
7:26-11.4(a)9i	Is the container designed to hold liquids or free liquids for a use other than storage, such as a battery?	—	—	—
7:26-11.4(a)9ii	Is the container very small, such as an ampule?	—	—	—
7:26-11.4(a)10	Are empty containers crushed flat, shredded, or similarly reduced in volume before it is buried beneath the surface of a hazardous waste landfill?	—	—	—
7:26-11.4(a)11	Does the owner or operator of a hazardous waste landfill continue to dispose of hazardous wastes subsequent to the detection of any liquid, in the secondary collection system?	—	—	—
7:26-11.4(b)	Does the owner or operator of a hazardous waste landfill maintain an operating record required in N.J.A.C. 7:26-9.4(i)?	—	—	✓

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.4(b)1	Does the owner/operator maintain a map, the exact location and dimensions, including depth of each cell with respect to permanently surveyed bench marks?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
7:26-11.4(b)2	The contents of each cell and the appropriate location of each hazardous waste type within each cell?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	Are containers holding liquid waste or waste containing free liquids placed in the landfill?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	Please describe the types and contents of such containers placed in the landfill.			
	Are empty containers placed in the landfill crushed flat, shredded or similarly reduced in volume before they are buried?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	Are small containers of hazardous waste in overpacked drums placed in the landfill?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
	If yes, please describe precautions taken to prevent the release of the waste.			

7:26-11.5

Incinerator

What type of incinerator is at the site (e.g., waterwall incinerator, boiler, fluidized bed, etc.)

List the types and quantities of hazardous waste incinerated.

	<u>YES</u>	<u>NO</u>	<u>N/A</u>
Is the residue from the incinerator a hazardous waste?	—	—	—

What types of air pollution control devices (if any) are installed in the incinerator unit?

Is energy recovered from the process?

If yes, describe.

What is the destruction and removal efficiency for the organic hazardous waste constituents?

7:26-11.5(b)1 Does the operating record include additional analysis and to determine types of pollutants which might be emitted including:

7:26-11.5(b)1i Heating value of the waste?

7:26-11.5(b)1ii Halogen and sulfur content?

7:26-11.5(b)1iii Concentrations of lead and mercury?

7:26-11.5(2) If no to any of the above questions, is there justification and documentation?

If operating, does it appear the incinerator is operating at steady state for conditions of operation, including temperature and air flow?

Monitoring and Inspection

7:26-11.5(c)1 Are existing instruments relating to combustion and emission controls monitored every 15 minutes?

If no, explain.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.5(c)1	Does the incinerator have all the following instruments for measuring: wastefeed, auxiliary fuel feed air flow, incinerator temperature scrubber flow, and scrubber pH? (Circle missing instruments.)	—	—	—
	If no, explain.			
7:26-11.5(c)2	Is the stack plume observed visually at least hourly for opacity and color?	—	—	—
7:26-11.5(c)3	Are there any signs of leaks, spill and fugitive emission associated with the pumps, valves, conveyors, pipes, etc?	—	—	—
	If yes, describe.			
7:26-11.5(c)3	Are all emergency shutdown controls and system alarms checked to assure proper operation?	—	—	—
	Is there any reason to believe the incinerator is being operated improperly? i.e., steady state conditions are not maintained.	—	—	—
	If yes, explain.			
7:26-11.5(c)3	Is the incinerator inspected daily?	—	—	—
7:26-11.5(e)	Is there open burning of hazardous waste?	—	—	<u>✓</u>
	If yes, what is being burned? (Only burning or detonation of explosives is permitted.)			
	If open burning or detonation of explosives is taking place, approximately what is the distance from the open burning or detonation to the property of others?			

	<u>YES</u>	<u>NO</u>	<u>N/A</u>
Are containers holding liquid waste or waste containing free liquids placed in the landfill?	—	—	—
Please describe the types and contents of such containers placed in the landfill.			
Are empty containers placed in the landfill crushed flat, shredded or similarly reduced in volume before they are buried?	—	—	—
Are small containers of hazardous waste in overpacked drums placed in the landfill?	—	—	—
If yes, please describe precautions taken to prevent the release of the waste.			

7:26-11.6

Thermal Treatment

What type of thermal treatment is at the site (e.g., waterwall incinerator, boiler, fluidized bed, etc.)

List the types and quantities of hazardous waste thermally treated.

Is the residue from the thermal treatment unit a hazardous waste?

What types of air pollution control devices (if any) are installed in the thermal treatment unit?



	<u>YES</u>	<u>NO</u>	<u>N/A</u>
Is energy recovered from the process?	—	—	—

If yes, describe.

What is the destruction and removal efficiency for the organic hazardous waste constituents?

7:26-11.6(b)1 Does the operating record include additional analysis and to determine types of pollutants which might be emitted including:

7:26-11.6(b)1i Heating value of the waste?

7:26-11.6(b)1ii Halogen and sulfur content?

7:26-11.6(b)1iii Concentrations of lead and mercury?

7:26-11.6(2) If no to any of the above questions, is there justification and documentation?

If operating, does it appear the thermal treatment unit is operating at steady state for conditions of operation, including temperature and air flow?

Monitoring and Inspection

Are existing instruments relating to combustion and emission controls monitored every 15 minutes?

If no, explain.

7:26-11.6(c)1 Does the thermal treatment have all the following instruments for measuring: wastefeed, auxiliary fuel feed air flow, incinerator temperature scrubber flow, and scrubber pH? (Circle missing instruments.)

If no, explain.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.6(c)2	Is the stack plume observed visually at least hourly for opacity and color?	—	—	—
7:26-11.6(c)3	Are there any signs of leaks, spill and fugitive emission associated with the pumps, valves, conveyors, pipes, etc?	—	—	—
	If yes, describe.			—
7:26-11.6(c)3	Are all emergency shutdown controls and system alarms checked to assure proper operation?	—	—	—
	Is there any reason to believe the thermal treatment unit is being operated improperly? i.e., steady state conditions are not maintained.	—	—	—
	If yes, explain.			—
7:26-11.6(c)3	Is the thermal treatment inspected daily?	—	—	—
7:26-11.6(e)	Is there open burning of hazardous waste?	—	—	✓
	If yes, what is being burned? (Only burning or detonation of explosives is permitted.)			—
	If open burning or detonation of explosives is taking place, approximately what is the distance from the open burning or detonation to the property of others?			—
7:26-11.7	<u>Chemical, Physical and Biological Treatment</u> (Other than in tanks, surface impoundments or plant treatment facilities)			—

		YES	NO	N/A
	Describe the treatment system at this facility and the types of wastes treated.			
7:26-11.7(a)2	Does the treatment process system show any signs of ruptures, leaks or corrosion? If yes, describe.			
7:26-11.7(a)3	Is there a means to stop the inflow of continuously-fed hazardous wastes? <u>Inspections</u>			
7:26-11.7(c)1	Is the discharge control safety equipment (e.g., waste feed cut-off systems, by-pass systems, drainage systems and pressure relief systems) in good working order?			
7:26-11.7(c)1	Are they inspected at least once each operation day?			
7:26-11.7(c)2	Does the data gathered from the monitoring equipment (e.g., pressure and temperature gauges) show treatment process is operating according to design?			
7:26-11.7(c)2	Is data gathered at least once each operating day?			
7:26-11.7(c)3	Are construction materials of the treatment process inspected at least weekly to detect corrosion or leaking of fixtures and seams?			
7:26-11.7(c)4	Are the discharge confinement structures (e.g., dikes) immediately surrounding the treatment unit inspected at least weekly to detect erosion or obvious signs of leakage (e.g., wet spots or dead vegetation).			
7:26-11.7(e)1	Are ignitable or reactive waste fed into the waste treatment system treated or protected from any material or conditions which may cause it to ignite or react? If yes, explain how.			✓

7:26-11.7(f)

Are the incompatible wastes placed in the same treatment process?

YES

NO

N/A

—

—

↓

If yes, please explain.

REFERENCE NO. 13



1201
13-18-05

State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT

John J. Trela, Ph.D., Acting Director

CN 028

Trenton, N.J. 08625

609-292-1250

Paul E. Wyszowski, P.E.
Manager, Environmental Management Department
AT&T Bell Laboratories
Whippany Road
Whippany, N.J. 07981-0903

18 NOV 1986

Dear Mr. Wyszowski:

RE: Extension of Due Date for Additional Information for Part B
Application of AT&T Bell Laboratories (Holmdel Site), Holmdel,
Monmouth County, EPA ID No. NJD 011 328 887

This letter responds to your letter of October 10, 1986 in which you request an extension of the due date of October 22, 1986 specified in my letter of September 22, 1986 due to additional time needed for preparation of a soil sampling and analytical plan and other required documents for the Part B application of the above referenced facility.

The Bureau of Hazardous Waste Engineering is agreeable to this request, and hereby extends the due date to December 3, 1986.

Should you have any questions on this matter, please call Bob Patel of my staff at (609) 633-0736.

Very truly yours,

Ernest J. Kuhlwein, Jr., Acting Chief
Bureau of Hazardous Waste Engineering

EP9/sg

c: Angel Chang, USEPA

REFERENCE NO. 14



AT&T Bell Laboratories

Whippany Road
Whippany, New Jersey 07981-0903
201 386-3000

MO-2F-204

December 3, 1986

Mr. Earnest J. Kuhlwein, Jr.
New Jersey Department of
Environmental Protection
Division of Hazardous Waste Management
CN 028
Trenton, New Jersey 08625

Subject: RCRA Part B Application
for AT&T Bell Laboratories (Holmdel Site),
Holmdel, Monmouth County, New Jersey
EPA I.D. No. NJD 011 328 887
Addendum

Dear Mr. Kuhlwein:

In response to the NJDEP checklist of incomplete items, dated September 26, 1986, we have prepared the following specific revisions and insertions and have included them in the enclosed three (3) copies of the revised RCRA Part B application for the above referenced project. We have also prepared and included there (3) copies of an addendum to the application which summarizes State comments, AT&T Bell Laboratories responses and references to specific sections of the Part B application that were revised to address State comments.

The specific NJDEP comments, AT&T responses and sections of the application revised are as follows:

Comment 1: Provide a copy of the Air Pollution Permit for the storage of waste solvents in the tank or a statement from the Bureau of Air Pollution Operations declaring that such permit is unnecessary.

Response 1: As per our discussion with Tom Micai of the NJDEP, under title 7 - chapter 27 and subchapters 8, 16, and 17, the subject tank is "grandfathered" and does not require an air emission permit. In addition, under subchapter 17 it is also exempt from the registration requirements.

Comment 2: Provide photographs of the hazardous waste storage in containers areas and hazardous waste storage in tank area as required under N.J.A.C. 7:26-12 (d) 13.

Response 2: Photographs of the hazardous waste storage areas are included in the general sections of the revised Part A application and are included within this addendum and the revised Part B application.

Comment 3a An updated NJDEP part A application is required, listing correct current NJDEP hazardous waste numbers and estimated annual quantities for each individual wastes to be stored in containers and the tank. There is no waste ID number listed for waste oil in the Part A application.

Page 3 of the part A application lists quantities of groups of hazardous waste and not that of individual wastes.

Response 3a: A revised and updated NJDEP Part A application has been included in the revised Part B application and a copy has been included within this addendum.

Comment 3b: Identify the location from which the waste types D001, D002, F001, and F005 (estimated 300 pounds of each waste type) are received from off-site. Also, explain why the company wants to receive these waste types at the Holmdel Site.

Response 3b: Information concerning locations from which waste types D001, D002, F001, and F005 are received from off-site as well as the rationale for this transfer are included in section 1.0 . These facilities include AT&T Crawford Hill, Middletown and the the Red Hill Road facilities which generate very small quantities of these waste types and are not permitted for this type of hazardous waste storage. The intention for this method of waste collection is to consolidate the wastes for shipment from one location in order to dispose of the material in the most environmentally sound and cost effective manner.

Comment 4: The waste analysis plan included in the part B does not address the following requirements:

- a. Chemical and physical properties of each waste.
- b. Equipment and procedure for collecting representative samples

- c. Frequency of a detailed analysis of waste streams. A detailed analysis of each waste is also required.
- d. Identify the methods of quality assurance and quality control to address all of the technical aspects of the waste analysis plan.

Response 4: The revised waste analysis plan is included in section 4.0 of the revised Part B. application. Identification of physical and chemical properties of each waste and frequency of detailed analysis are outlined on tables 4-2 and 4-3 which are included with this addendum. Equipment and procedures for collection on representative samples as well as quality assurance and quality control measures to address all technical aspects of the waste analysis plan are also discussed in section 4.0. Samples will be collected with equipment such as a bacon bomb sampler for the tank or glass coliwasa for the drums and analyzed by a NJDEP certified laboratory. Quality control samples will also be utilized to insure accurate analytical results.

Comment 5: Documentation of an updated inspection schedule in the facility general inspection plan is required. The updated schedule should include the following additional items.

- a. Inspection and frequency for labeling of containers, sealing of containers, condition of container, condition of the storage pad, valve operation position for drainage system and adequate operational condition of shower and eye wash system.
- b. Inspection and frequency for waste loading pad drain, base of the pit for visible cracks, piping and valve, sump pump, ladder and platform condition in the hazardous waste storage in tank area.

Response 5: An updated inspection schedule in the facility general inspection plan has been included in section 6.0 - table 6-1 of the revised Part B application and a copy included within this addendum. This schedule addresses all additional items as requested.

Comment 6: Documentation demonstrating coordination agreements with hospitals is required according 1 N.J.A.C. 7:26-9.6(f).

Response 6: As previously discussed, the Holmdel location has its own medical facilities including a staff of doctors and nurses who respond to medical emergencies at the facility. In addition, the facility has established a strong working relationship with Bayshore Hospital. Documentation on the coordination agreements between Bayshore and the Holmdel facility will be forwarded under separate cover.

Comment 7: Documentation of job descriptions, qualifications and the responsibilities for each position of the employee who works with hazardous waste handling at the facility pursuant to N.J.A.C. 7:26-9.4(g)6ii is required.

Response 7: Job descriptions, qualifications and the responsibilities for each position of employees that work with hazardous waste handling at this facility are included in section 20.0 supplement 20-1 and are included within this addendum.

Comment 8 A detailed description of procedures to prevent clogging of the waste pouring device and its connecting piping used for unloading operation of waste into the tank is required according to N.J.A.C. 7:26-12-2(e)10.

Response 8 A detailed description of procedures to prevent clogging of the waste pouring device and its connecting piping are outlined in section 10.0. This station will be equipped with a screen which is intended to separate any solids within the wastes being transferred. Standard operating procedures will include removal of any accumulated solids before and/or after the transfer of any waste materials.

Comment 9: a. A topographic map according to N.J.A.C. 7:26-12-2(e)13 is required, showing:

b. All public buildings with known names within one mile of the facility.

c. All residential buildings within 1000 feet of the facility. If there is no residential building within one mile of the facility, then list the distance of the nearest residential building from the facility.

Response 9: Copies of the revised topographic map are included in section 13.0 of the revised Part B application and are included within this addendum.

There are no residential buildings within 1,000 feet of the facility. The nearest residential building is located approximately 1,700 feet to the west of the facility. Public buildings within one mile of the facility include buildings in Holmdel Park utilized for the Longstreet Farm and are shown on figure 13-2.

A record search of NJDEP - Division of Water Resources, Bureau of Water Allocation was conducted in an attempt to determine the specific water use for these wells. The only information available indicates that wells D-1 - D-3 and D-7 - D-10 were designated as domestic wells, wells I-4 - I-6 were designated for pre-cooling, condensate make-up and fire fighting protection and well I-11 as general water use.

Comment 10: Documentation demonstrating structural integrity of the base underlying the tank in hazardous waste storage in tank area and the ability of the base to contain spills, leaks and accumulated liquid as required by N.J.A.C. 7:26 - 10.5(d).

Response 10: Design drawings of the base underlying the tank in the hazardous waste storage area have been reviewed and evaluated for the ability of the base to contain spills, leaks and accumulated liquid and this is discussed in section 9.0 of the revised Part B permit application.

✓
The containment vault base for this tank is constructed of 2 feet of epoxy coated reinforced concrete which is compatible with the waste material stored and the vault has sufficient capacity to contain the entire tank capacity. The containment vault is covered by a wooden framed asphalt-shingled roof and extends above ground elevation to eliminate run-on into the containment area and minimize accumulation of precipitation. The base of the vault is also sloped to a sump pump designed to pump any accumulated liquids back into the tank which is raised above the vault base to eliminate contact with liquids.

Comment 11: Submission of current shell thickness of the hazardous waste storage tank as required under N.J.A.C. 7:26-10.5(b).

Response 11: Submission of the most recent shell thickness of the hazardous waste storage tank is included in section 6.0 of the revised Part B application. The shell thickness of 5/16 of an inch was last checked in 1978. Subsequent to this the tank was internally inspected in 1980 and the epoxy coating was found to be in excellent condition with no apparent deterioration. Present shell thickness, therefore, is presumed to be 5/16 of an inch.

Comment 12: Documentation demonstrating the use of overfilling control equipment to prevent overfilling is required to comply with the requirements of N.J.A.C. 7:26-10.5(c)2i.

Response 12: Procedures utilized to prevent overfilling of the hazardous waste tank are described in section 10.0 of the revised Part B permit.

Standard operating procedures for this facility also include a daily check of the waste level within the tank. The tank contents are pumped out and properly disposed well in advance of the waste quantity reaching tank capacity. This tank is typically pumped out when the capacity reaches approximately 5,000 gallons. This practice eliminates the possibility of tank overfilling.

Comment 13 As a matter of policy, the Department of Environmental Protection is requiring waste TSD facilities to submit a soil sampling and analysis plan to monitor exposed earthen surfaces in the immediate areas where hazardous wastes are transferred or stored, as well as, solid sedimentation accumulations in drainage systems subject to contamination by hazardous waste residues and constituents. The soil sampling plan shall provide for initial comprehensive analysis of the soils and sediments at the facility for residues of all hazardous waste and hazardous waste constituents, and for facility-specific hazardous waste residues and constituents on a annual basis thereafter.

Response 13. Appendix A in the revised Part B application is the soil/sediment sampling plan for this facility. A copy of this sampling plan is also attached to this addendum.

If you have a need for further information regarding this submittal please contact myself at (201) 898-1371 or David Cesareo at (201) 898-1375.

Very truly yours,

David J. Cesareo
for Paul E. Wyszowski, P.E.
Manager
Environmental Management Department

RCRA PERMIT APPLICATION
FOR
AT&T BELL LABORATORIES
HOLMDEL FACILITY
CRAWFORDS CORNER ROAD
HOLMDEL, NEW JERSEY 07733

December 1986

STATE OF NEW JERSEY
DEPARTMENT OF ENVIRONMENTAL PROTECTION
OFFICE OF PERMITS
PO BOX 287
TRENTON, NJ 08646
TEL: (609) 292-2000
FAX: (609) 292-2001

12/1/86

RCRA PERMIT APPLICATION INFORMATION

EPA ID No.	NJD011328887
Permit Request	Permit to Store Waste in Containers and in a Storage Tank
Facility Name	AT&T Bell Laboratories Holmdel
Facility Address	Crawfords Corner Road Holmdel, New Jersey 07733
Facility Contact	Paul E. Wyszowski, P.E. Manager Environmental Management Department
Date of Application	May 1986

(CAA22/39)



"DRUM STORAGE AREA"

Holmdel



"WASTE STORAGE TANK"

Holmdel

1.0 GENERAL FACILITY DESCRIPTION AND LOCATION INFORMATION

The Holmdel facility of AT&T Bell Laboratories is located at Crawford Corners Road in Holmdel Township, Monmouth County, New Jersey. The facility consists of a large main building surrounded by several small buildings situated on approximately 500 acres. The facility consists of laboratories and offices employing approximately 8,000 employees who perform communications-related research.

The hazardous waste facilities at the Holmdel facility are situated at two locations on the site:

- (1) A 6,000-gallon concentrated waste storage tank is constructed of lined steel and located below grade within a concrete vault. Adjacent to this tank is a diked concrete slab where the liquid waste in drums is stored.
- (2) A small container storage area is located within the laboratory wastewater treatment facility; the area consists of two masonry block rooms and one flammable liquid storage cabinet.

The tank vault is constructed of concrete, has inside dimensions of 11 feet by 21 feet by 12-1/2-feet deep and has a wall thickness of 14 inches. The tank is situated on a reinforced concrete slab that has a thickness of two feet. The vault has both an internal and external coating, and is equipped with a sump pump and a ventilation system.

A steel grating is located above the tank at the top of the vault. A wood-framed asphalt-shingled roof covers the waste liquid storage tank and vault system.

The concentrated waste storage tank receives small quantities of miscellaneous liquid wastes from research and development laboratories within the main building. These wastes are fed into the tank through a manual pouring station. The majority of the wastes that are poured into the tank are miscellaneous solvents which primarily include acetone, methanol, trichloroethane, and trichloroethylene. Approximately once per year the contents

of the tank are removed off site for treatment. The proper manifests are completed for this removal.

The drum storage area is comprised of a 14-foot 2-inch by 39-foot 6-inch concrete pad with 6-inch-high curbing on three sides. The pad slopes away from the noncurbed side toward a collection drain. This drain is connected to the concentrated waste storage tank. The drums are stored within this area on wooden pallets.

The materials that are stored in the drum storage area are waste liquids that normally are limited to spent etching solution and waste paint thinner and other spent solvents such as the ones listed above for the concentrated waste storage tank.

The etching solution currently used at the Holmdel facility is the Philip A. Hunt Chemical Corporation's Endura-Etch. The spent solution is corrosive and contains ammonium hydroxide, ammonium chloride, and copper. Periodically the spent etching solution is shipped with the proper documentation back to the Philip A. Hunt Chemical Corporation, where it is recycled.

The paint thinner utilized at the Holmdel facility is 100 percent odorless mineral spirits. Periodic shipments of the waste paint thinner are shipped with the necessary documentation for offsite disposal.

Limited amounts of ignitable, corrosive, spent halogenated solvents and spent nonhalogenated solvents are periodically received during the year from other AT&T Bell Laboratories Facilities. These facilities include the Crawford Hill, Middletown and Red Hill Road Facilities which generate very small quantities of these hazardous wastes (less than 50 kg/m) and are not permitted for storage. The intention for this method of waste collection is to dispose of this waste in the most environmentally sound and cost-effective manner.

The small container storage area receives small amounts of waste chemicals from miscellaneous laboratory operations within the Holmdel facility. These materials are identified by the laboratory occupants prior to removal

to the small container storage area.

Periodically (approximately once per month) the waste materials within the small container storage area are packaged (lab packed) by an outside contractor and transported off site for treatment or disposal.

(CAA41/4)

9.0 DETAILED FACILITY DESCRIPTION

9.1 DESIGN CAPACITY

The hazardous waste facilities at the Holmdel facility are described in Section 1.0. The design capacity at each location is as follows:

1. A 6,000-gallon concentrated waste storage tank located below grade is contained within a concrete vault. Adjacent to this tank is a diked concrete slab where drummed liquid wastes are stored.
2. A small container storage area located within the laboratory wastewater treatment plant consists of two small storage rooms and one flammable liquid storage cabinet. Each storage room has a diked reservoir that will contain between 40 and 42 gallons of spilled liquids. The flammable liquid storage cabinet has a diked reservoir that will contain approximately 15 gallons.

9.2 ESTIMATED LIFE EXPECTANCY

The hazardous waste facilities ultimately will be closed when the Holmdel facility is closed or when operations no longer require such facilities. The closure of these facilities is not anticipated within the foreseeable future. However, for the purposes of regulatory compliance only, it is anticipated that hazardous waste will no longer be generated at the facility in 2085.

9.3 CONCENTRATED WASTE STORAGE TANK

The layout of the concentrated waste storage tank including cross sections of the tank, vault, and underground piping is shown in Drawing 1. This figure also identifies a pump located between the storage tank and the drum storage area that is used to transfer the liquid waste to tank trucks for disposal.

The concentrated waste storage tank and drum storage area is enclosed by a 6-foot chain link fence (described in Section 5.0). Access is limited to this area through a double swing gate at the drum storage pad. An emergency eyewash and shower is inside the fence adjacent to the drum storage pad. A fire extinguisher and protective clothing are located at the concentrated waste storage tank. The locations of emergency equipment are shown in Drawing 1.

The containment vault base from this tank is constructed of 2 feet of epoxy coated reinforced concrete which is compatible with the waste material stored and the vault has sufficient capacity to contain the entire tank capacity. The containment vault is covered by a wooden framed asphalt-shingled roof and extends above ground elevation to eliminate run-on into the containment area and minimize accumulation of precipitation. The base of the vault is also sloped to a sump pump designed to pump any accumulated liquids back into the tank which is raised above the vault base to further eliminate contact with liquids.

9.4 SMALL CONTAINER STORAGE AREA

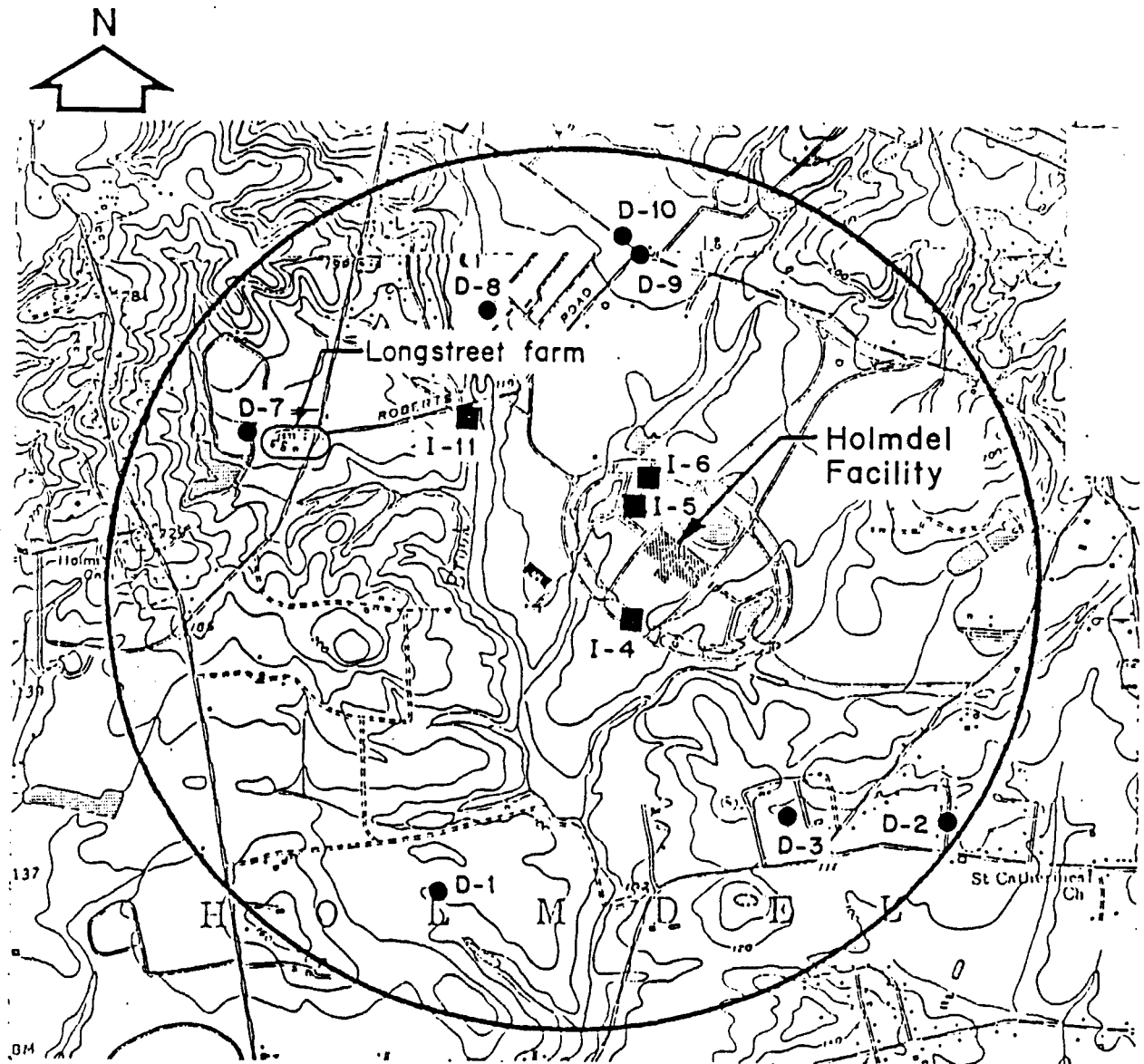
The small container storage area is shown in Figure 9-1. A ducted fan system is used to vent the two storage rooms and the flammable liquid storage cabinet to the outside atmosphere. Safety equipment, including an emergency shower, first aid kit, fire blanket, fire extinguisher, and self-contained breathing apparatus, is located in an adjacent room (see Figure 9-1).

9.5 SANITARY AND STORM SEWERS

There are no sanitary sewer inlets within the fenced areas of the concentrated waste storage tank. The drum storage area includes a catch basin that drains storm water from the bermed area to the adjacent stream. A manually operated valve on the drain line is used to divert spilled liquids from the drum storage area to the concentrated waste storage tank. During

periods of rain the valve is opened to allow rain water to discharge into the adjacent stream. The drainage system for the entire facility is shown in Drawing 2.

(CAA41/12)



- Industrial well location
- Domestic well location

1,000 0 1,000
Scale Feet

CDM

environmental engineers, scientists,
planners & management consultants

Figure 13-2
Well and Water Suppliers
Within 1 Mile of The Site

AT&T Bell Laboratories - Holmdel, New Jersey

SUPPLEMENT 13-1

CONSTRUCTION DATA FOR WELLS INVENTORIED
WITHIN ONE MILE OF THE SITE

TABLE 1

Construction Data for Wells Inventoried Within One Mile of the Site

Well Number	Owner	Year Drilled	Depth (ft)	Casing Diameter (in)	Screened Interval (ft)	Elevation (ft)
D-1	Stillwell, Stan	1965	112	4	106-112	100
D-2	Petruszella, Nick	1949	141	6	135-141	130
☆ D-3	Harding, Mrs.	UKWN	210	6	200-210	120
I-4	Bell Tele. Co.	1956	224	8	194-224	105
I-5	Bell Tele. Co.	UKWN	214	10	173-214	120
I-6	Bell Tele. Co.	UKWN	221	10	191-221	120
D-7	Duncan, W. J.	1954	176	6	172-176	145
D-8	F&F Nurseries	UKWN	200	6	190-200	135
D-9	Stillwell, Stan	1956	72	4	68-72	140
D-10	Stillwell, Stan	UKWN	153	4	147-153	147
I-11	Western Elec. Co.	UKWN	220	0	179-220	120

14.0 ONE-HUNDRED YEAR FLOODPLAIN IDENTIFICATION


The concentrated waste storage tank and the small container storage area at the AT&T Holmdel facility are not located within the limits of the 100-year floodplain. The Federal Emergency Management Agency National Flood Insurance Rate Map for the Township of Holmdel, New Jersey was referenced to identify potential flood hazards affecting the waste facilities. The flood map identifies the areas of the hazardous waste facilities as Zone C, which is designated as an area of minimal flooding. The nearest 100-year floodplain is shown in Figure 14-1.

(CAA41/17)



REFERENCE:
KEYPORT, N.J. MARLBORO, N.J. USGS QUADS

NOTE:

 INDICATES LIMITS OF 100 YR. FLOOD
TAKEN FROM FLOOD INSURANCE RATE MAP.

CDM

environmental engineers, scientists,
planners & management consultants

AT+T BELL LABORATORIES

HOLMDEL FACILITY

FIGURE 14-1

FLOOD MAP.

15.0 CLOSURE PLAN

15.1 PURPOSE

The Closure Plan identifies the procedures required to close the hazardous waste facilities at AT&T in Holmdel. This plan complies with EPA's regulations under RCRA and NJDEP's regulations regarding the closure of hazardous waste facilities. All references to state or federal agencies refer to both EPA and NJDEP agencies with authority over facility closure. All contractors and facilities used in the closure procedure will be properly licensed by EPA or NJDEP as appropriate.

15.2 RESPONSIBLE PARTY

The Manager of Operations and Maintenance for the Holmdel facility is responsible for maintaining this Closure Plan and implementing it at closure.

15.3 MAXIMUM INVENTORY

Concentrated waste storage tank	6,000 gallons
Drum storage area	950 gallons
Small container storage area	25 gallons

15.4 TIME OF CLOSURE

The above hazardous waste facilities will be ultimately closed when the Holmdel facility is closed or when operations no longer require such facilities. The closure of these facilities is not anticipated within the foreseeable future. However, for the purposes of regulatory compliance only, it is anticipated that hazardous waste will no longer be received at the site in 2085.

Due to the nature of the facilities, partial closure is considered inapplicable. Ultimate closure of the facilities will include the removal of all hazardous waste and residues and will be completed within 180 days of receiving the final volume of hazardous waste, or within 180 days of receipt of NJDEP approval.

15.5 CLOSURE STEPS AND PROCEDURES

The hazardous waste facilities will be closed by removing all hazardous waste and residues. All hazardous waste materials will be disposed of at a state or federally permitted treatment, storage, and/or disposal (TSD) facility.

The following steps will be taken to close the facilities:

Waste Liquid Storage Tank

1. Enter into an agreement with an approved clean-up contractor and a permitted hazardous waste bulk transporter to remove the contents of the tank and properly transport this material to the selected permitted TSD facility. Proper hazardous waste manifest forms will be utilized when transporting this waste material. Removal of the contents of the tank will include all liquid waste and residual sludge.
2. Utilize contract services to triple rinse the tank, feed pipe, and pouring station. Each rinse will be carried out using at least 600 gallons of water. Following each rinse step, the tank contents will be removed by the clean-up contractor for subsequent transport and offsite treatment or disposal in accordance with federal and state hazardous waste regulations.

A sample of the final rinse will be taken and analyzed for indicator parameters to confirm the removal of all hazardous waste from the tank and feed system. The analyses will include determinations for total copper by atomic absorption, and chlorinated and nonchlorinated solvents by gas chromatograph. The following concentration levels will be used as guidelines to determine complete removal:

Copper	170 ppm
Chlorinated and Nonchlorinated Solvents	100 ppb

If these levels are exceeded, further rinsing will be performed.

3. Utilize plant staff services to seal off pipe inlets to the tank other than ventilation stacks until a decision for disposition or reuse of the tank is made.

4. Certify closure as described below.

Drum Storage Area

1. Enter into an agreement with an approved clean-up contractor and a permitted hazardous waste transporter to remove the drums from the drum storage area and transport this material to the selected permitted TSD facility. Proper hazardous waste manifest forms will be utilized when transporting this waste material.
2. Perform wipe samples of the storage area to determine if hazardous waste contamination exists. The samples will be taken at the low point of the concrete pad in the area of the collection drain. These samples will be analyzed for total copper by atomic absorption techniques.

A concentration of 170 ppm of total copper will be used as a guideline to determine if clean-up is warranted. If this concentration is exceeded, the drum storage area will be washed with a commercial cleaner and Step 2 will be repeated.

If cleaning is required, it is estimated that approximately 10 gallons of wash water will be generated. This wash water will be properly packaged and transported off-site for treatment.

3. Certify closure as described below.

Small Container Storage Area

1. Enter into agreement with an approved hazardous waste contractor to properly package the waste material from the small container storage area and transport this material to the selected TSD facility. Proper hazardous waste manifest forms will be utilized when transporting this waste material.
2. Perform wipe samples of the area to determine if hazardous waste contamination exists. These samples will be analyzed for arsenic, barium, and selenium by atomic absorption techniques.

The following concentration levels will be used as guidelines to determine if clean-up is warranted:

Arsenic	20 ppm
Beryllium	Area background (typically 1-7 ppm)
Selenium	20 ppm

If the above concentrations are exceeded, the small container storage area will be washed with a commercial cleaner and Step 2 will be repeated.

If cleaning is required, an estimated five gallons of wash water will be generated. This wash water will be properly packaged and transported off site for treatment.

21.0 STORAGE VESSELS

21.1 CONCENTRATED WASTE STORAGE TANK

The concentrated waste storage tank has a capacity of 6,000 gallons, is constructed of lined steel, and is contained below grade within a concrete vault. This tank, which is 8 feet in diameter by 16.75 feet long, has an epoxy interior lining that resists the waste materials and has an exterior protection coating. The connections to the tank include:

- Feed pipe (to pouring station)
- Drain connection from drum storage pad (normally valved shut)
- Vent pipe
- Sounding pipe
- Suction connection

A piping diagram is shown in Figure 21-1.

The tank vault is constructed of concrete, has inside dimensions of 11 feet by 21 feet by 12.5 feet deep, and has a wall thickness of 14 inches. The tank is situated on a reinforced concrete slab that has a thickness of 2 feet. The vault has both an internal and external coating and is equipped with a manual sump pump and a ventilation system.

A steel grating is located above the tank at the top of the vault. A wood-framed asphalt-shingled roof covers the concentrated waste storage tank and vault system. This design permits visual inspection of the tank and vault system.

Since the waste is manually poured into the tank, the operator is aware of the possibility of overfilling. This is further discussed in Section 10.0 - Special Handling.

21.2 CONTAINERS

Container storage at the Holmdel facility is limited to the drum storage area and the small container storage area.

The drum storage area is comprised of a 14.2-foot by 39.5-foot concrete pad with 6-inch-high curbing on three sides. The pad slopes from the noncurbed side toward a collection drain. This collection drain is normally open to the tank in order to retain waste that may leak from the drums. The drain can also be open to a nearby stream in order to remove accumulated precipitation and run-off from the concrete pad. In the event of a spill, the waste can be identified by the drum from which it came. The concrete pad is shown in Drawing 1.

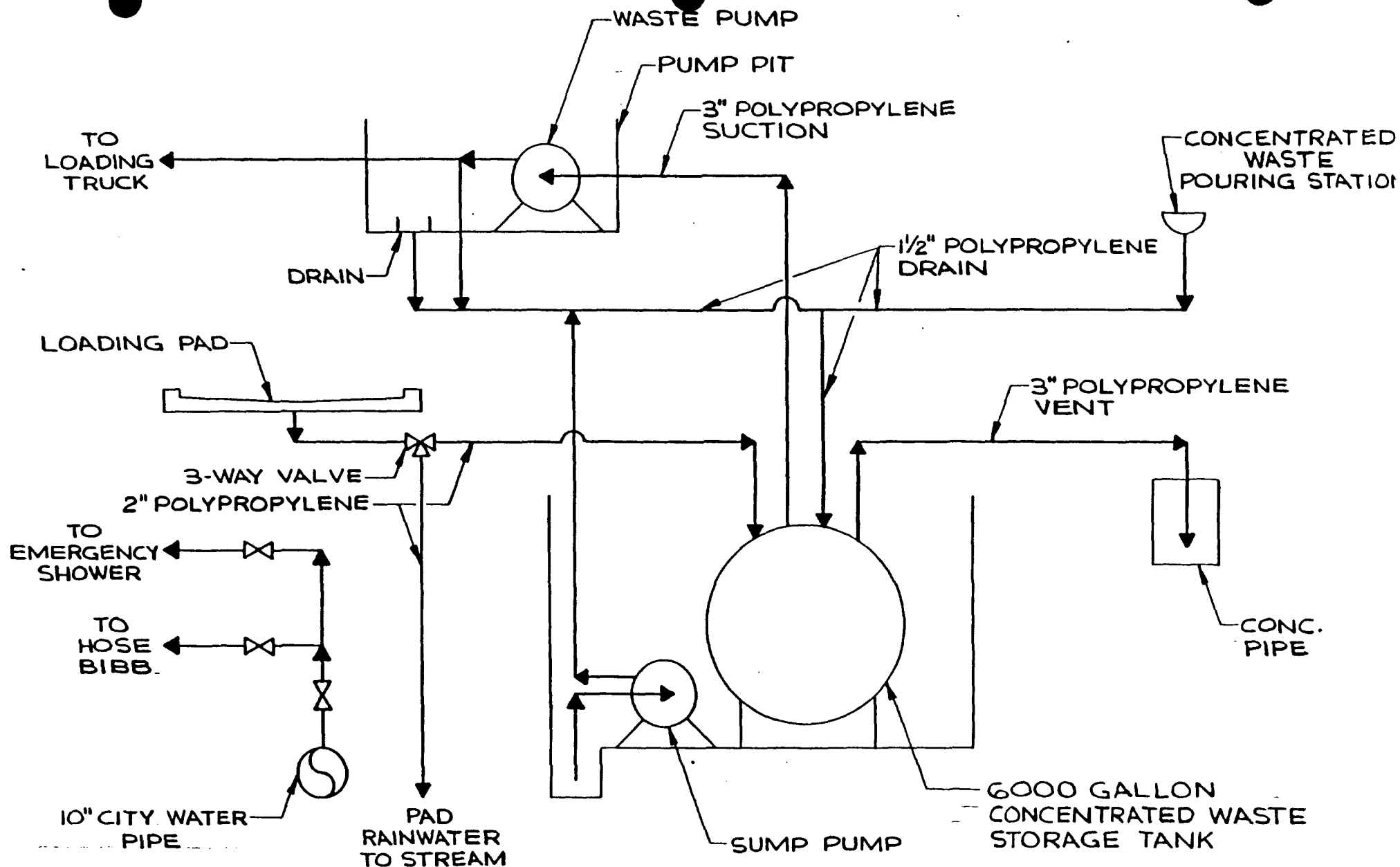
The approximate capacity of the curbed area is 2,100 gallons, 220 percent of the maximum expected drum volume of 950 gallons. The drums are stored on pallets to prevent them from contacting standing liquids in the curbed area.

The containers stored in the small container storage area are comprised mostly of small bottles. They are stored in one of two masonry block rooms or in the flammable storage cabinet. Each storage device has a reservoir at the bottom to contain spilled waste. The capacities of the reservoirs in the cinder block rooms are 40 and 42 gallons. The capacity of the reservoir in the flammable storage cabinet is approximately 15 gallons. The estimated maximum volume of waste to be stored in the entire small container storage area is 25 gallons. The bottles are stored on shelves to prevent them from contacting any spilled liquid.

The three storage devices in the small container area allow incompatible wastes to be segregated so that they do not come into contact during a spill.

If a spill occurs, the waste can be identified by the bottle that it came from. If more than one bottle is leaking, a sample can be taken from the reservoir and the waste can be removed from the reservoir and containerized.

(CAA41/24)



CDM

environmental engineers, scientists,
planners & management consultants

AT+T BELL LABORATORIES
HOLMDEL FACILITY

FIGURE 21-1
PIPING DIAGRAM

22.0 WASTE MINIMIZATION REQUIRED BY HAZARDOUS
SOLID WASTE AMENDMENTS OF 1984

NEW JERSEY DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF WASTE MANAGEMENT
HAZARDOUS WASTE MINIMIZATION SURVEY

HAZARDOUS WASTE GENERATOR WASTE REDUCTION PROGRAM, FY 1985

- Please complete both sides -

Company: Bell Telephone Laboratories, Incorporated NJD011328887
(Name) (EPA ID Number)

Mailing Address: Rm. 1E-229, 600 Mountain Ave., Murray Hill, NJ 07974
(Street) (City) (Zip Code)

Location of Generator Site: Crawford Corner Road, Holmdel, NJ 07733
(if different from mailing address)

Contact Person: Paul E. Wyszowski, P.E. (201) 582-4868
(Name) (Telephone Number)
Paul E. Wyszowski Manager, Environmental
(Signature) (Title)
Management Department

Please provide information about your company's hazardous waste minimization program. (If more space is needed, please answer on a separate sheet of paper and attach it to the questionnaire.)

1. Separation

Is your company's waste collection system designed to decrease the volume of hazardous waste by keeping hazardous waste separate from non-hazardous waste?

Yes ☒ No

If yes, has the system been improved in the past year to further reduce the amount of hazardous waste?

Yes No ☒

What reduction in volume was achieved in the last year?

2. Substitution

Has your company substituted a hazardous material with a non-hazardous or less hazardous material to reduce either the amount or toxicity of hazardous waste generated by your operation?

Yes No ☒

If yes, when was the substitute introduced, and to what extent has it reduced the toxicity or amount of hazardous waste generated in the last year?

3. Efficiency

Has your company improved the efficiency of operations so as to reduce the amount of hazardous waste generated?

☒ Yes

☐ No

If yes, please describe it briefly and state when it was instituted.

A list of revised waste disposal practices was under development in 1986.

What amount of waste reduction was achieved in the last year?

An accurate assessment of the effects of these revisions will not be possible before 1986.

4. Recycling on-site

Does your company's waste reduction program include a hazardous waste recycling operation on-site?

☐ Yes

☒ No

If yes, please briefly describe the recycling operation and state when it was instituted.

What amount of waste reduction was achieved in the last year?

5. Treatment on-site

Does your company's hazardous waste reduction program include on-site waste treatment which minimizes the toxicity or amount of hazardous waste generated?

☐ Yes

☒ No

If yes, please briefly describe the treatment operation and state when it was instituted.

To what extent has the treatment operation reduced toxicity or reduced the amount of hazardous waste generated in the past year?

**Information Regarding Potential Hazardous Waste and Hazardous Waste
Constituent Releases From Solid Waste Management Units**

Facility Name: AT&T Bell Laboratories - Holmdel

EPA I.D. No.: NJD011328887

Location: Street Crawfords Corner Road

City & State Holmdel, NJ

Check: owner X operator X

Please review the following definitions prior to proceeding to page 2.

- I. Under the Resource Conservation and Recovery Act (RCRA) amendments of 1984, the term "solid waste" means any garbage, refuse, sludge, from a waste treatment plant, water supply treatment plant, or air pollution control facility and other discarded material, including solid, liquid, semisolid, or contained gaseous material resulting from industrial, commercial, mining, and agricultural operations, and from community activities, but does not include solid or dissolved material in domestic sewage, or solid or dissolved materials in irrigation return flows or industrial discharges which are point sources subject to permits under section 402 of the Federal Water Pollution Control Act, or byproduct material as defined by the Atomic Energy Act of 1954.
- II. A hazardous waste is a solid waste that is either listed in 40 CFR; Part 261; Subpart D ("List of Hazardous Wastes") or possesses one or more of the characteristics identified in 40 CFR; Part 261; Subpart C ("Characteristics of Hazardous Waste") and is not excluded in 40 CFR 261.4.
- III. A Hazardous Waste Constituent represents the basis for a specific hazardous waste being listed in 40 CFR; Part 261; Subpart D. The Hazardous Waste Constituents are listed in 40 CFR; Part 261; Appendix VIII (Hazardous Waste Constituents).
- IV. The term "solid waste management unit" (SWMU) applies to any landfill, surface impoundment, land farm, waste pile, incinerator, tank, injection well, transfer station, waste recycling operation, tank or container storage area that currently or formerly was used to manage a solid waste.
- V. Under the requirements of the Hazardous and Solid Waste Act Amendments of 1984, Section 3004U of the RCRA amendments mandates that EPA address contamination caused by prior releases of hazardous wastes and hazardous waste constituents from solid waste management units, regardless of the time when the waste was placed in the unit or when the unit was closed.
- VI. The term "tank" includes wastewater treatment units, elementary neutralization units and short-term accumulation units that are exempted from RCRA permit requirements.
- VII. The term "release" includes any spilling, leaking, pumping, pouring, emitting, emptying, discharging, injecting, escaping, leaching, dumping or disposing into the environment, but excluding releases otherwise permitted under law (e.g., NPDES permitted discharges).

SPECIFIC INFORMATION

Are there any of the following solid waste management units existing or closed at your facility? Include any units you are aware of that were used by previous owners. Do not include hazardous waste units currently shown in your E application.

	<u>Yes</u>	<u>No</u>
• Landfill	---	---
• Surface Impoundment	---	---
• Dump-pit or Leach Field	---	---
• Land Farm	---	---
• Waste Pile	---	---
• Incinerator	---	---
• Storage Tank (above ground)	---	---
• Storage Tank (below ground)	<u>X</u>	---
• Container Storage Area	---	---
• Injection Wells, Sink Holes	---	---
• Wastewater Treatment Units	---	---
• Transfer Stations	---	---
• Waste Recycling Operations	---	---
• Other (specify)	---	---

(For items 2-4, if the space provided is not sufficient, use additional sheets as necessary and specify the item being answered.)

2.) If there are "Yes" answers to any of the items in number one above, please provide the following:

A. A description of the wastes that were stored, treated or disposed of in each unit.

The tank was taken out of service in September, 1971.

Prior to that it was used to store spent stripping
and cleaning bath solutions from electroplating
operations.

B. Determine, as best you can, if the particular waste would be considered a hazardous waste or hazardous waste constituent under RCRA (See definitions on page one)

Yes, most likely F007, spent cyanide plating bath
solutions, or F009, spent strippers and cleaning
bath solutions from electroplating operations where
cyanides were used.

- C. A description of each unit including its capacity, dimensions, period of operation, location at facility including a site plan if available.

Capacity: 5,000 gallon steel underground storage tank

Period of Operation: It was in use between 1964 and 1971.

Location: Northeast of service building.

- 3.) For each unit noted in number one and also those hazardous waste units identified in your Part B application, please provide the following information on any prior or current release of hazardous waste or hazardous waste constituents.

source of information that has led to the possibility that a release has occurred (i.e. discoloration of surrounding soil)

date(s) of release

groundwater monitoring data for units not identified in your Part B

type of waste/material released

quantity or volume of waste/material released

nature of release (i.e., spill, overflow, ruptured tank or pipeline, leachate from landfill or surface impoundment, etc.)

resulting groundwater inflow into the feed piping
system manholes.

- 4.) In regard to the prior releases described in number three above, please provide (for each unit) any analytical data that may be available which would describe the nature and/or extent of environmental contamination that exists as a result of such releases. In addition, any information on the concentration of hazardous waste or hazardous waste constituents present in contaminated soil, groundwater or surface water should be attached. Include any information/data (including groundwater monitoring data) submitted to EPA and the State under any other regulatory programs (i.e. Superfund, In place-toxics, etc.) that concerns prior or continuing releases as described above.

There was no sampling or analytical work done in regard
to this event.

- 5.) If you do not have any record of a SMD on your site, is there any evidence from soil borings, drilling of groundwater wells, groundwater monitoring results, exploratory pits or any excavations that would indicate the presence of a SMD or that a release of hazardous waste or hazardous waste constituent has occurred (Please describe the type of activity and observations that led to the discovery)?

N/A

1.0 SAMPLING AND ANALYSIS PLAN OVERVIEW

1.1 INTRODUCTION

This proposed sampling and analysis plan for the AT&T BELL Laboratories, Holmdel facility, located in Monmouth County, has been prepared in order to fulfill the requirements of the Resource Conservation and Recovery Act (RCRA), Part B permit application.

This plan has been prepared based on current information presented in the permit application, other background data and site visits. It addresses areas of the facility where transfer and storage operations of hazardous wastes could potentially cause contamination of surficial soils throughout the site.

The sampling and analysis program presented herein is designed to monitor exposed earthen sufaces in the immediate areas where hazardous wastes are transferred and stored, as well as solid sedimentation accumulations in on-site drainage systems which are subject to possible contamination by hazardous waste residues and constituents. The initial chemical analysis will be performed by a state certified laboratory and will serve to establish background levels of contaminants in surface soil. This sampling plan will also be performed on an annual basis.

1.2 SCOPE OF WORK

The sampling and analysis plan presented herein entails the following:

- o Collect soil samples at the surface (0-6") beneath the waste pouring station, adjacent to the tank pump-out pit and from the drainage ditch near the drum storage pad.
- o Collect a sediment sample from the catch basin situated in the drum storage area.

This sampling plan will culminate in a summary letter which will present the results and conclusions of the sampling and analysis plan. The letter

will make recommendations for additional sampling (if contamination exists) and will provide the basis for proposing a course of action as part of a cleanup plan, if one is required. If contamination is not significant, background levels for further action will be developed and used for annual sampling results comparison.

1.3 SITE DESCRIPTION

The Holmdel facility of AT&T Bell Laboratories is located at Crawford Corners Road in Holmdel Township, Monmouth County, New Jersey. The facility consists of a large main building surrounded by several small buildings situated on approximately 500 acres. The facility consists of laboratories and offices employing approximately 8,000 employees who perform communications-related research.

The hazardous waste facilities at the Holmdel facility are situated at two locations on the site:

1. A 6,000-gallon concentrated waste storage tank is constructed of lined steel and located below grade within a concrete vault. Adjacent to this tank is a diked concrete slab where the liquid waste in drums is stored.
2. A small container storage area is located within the laboratory of a wastewater treatment facility; the area consists of two masonry block rooms and one flammable liquid storage cabinet.

1.4 SAMPLING LOCATIONS AND ANALYSES

Figure 2 indicates proposed sampling locations. This plan addresses sampling of surficial soil beneath the waste pouring station, adjacent to the waste tank pump-out pit, and from a drainage ditch located near the drum storage pad. These locations represent the most likely areas that would be contaminated during the transfer of hazardous substances in the event of minor spillage or dripping.

Sampling of soils will consist of collection of surficial samples (0-6") at one location for each point of concern. One sediment sample will also be collected from the catch basin in the drum storage area. Analysis of all samples will consist of priority pollutant metals, the volatile organic fraction of the priority pollutant scan plus 15 peaks and petroleum hydrocarbons.

Table A-1 summarizes the soil and sediment sampling locations and analyses. Table A-2 lists the number of samples and analytical methods that will be utilized. Table A-3 lists the sample containers for the particular analyses and the preservation requirements.

REFERENCE NO. 15



Don
C. Under
C

State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT

John J. Treia, Ph.D., Acting Director
CN 028
Trenton, N.J. 08625
609 - 292 - 1250

Paul E. Wyszkowski, P.E.
Manager, Environmental Management Department
AT & T Bell Laboratories
600 Mountain Avenue
Murray Hill, New Jersey 07974

16 DEC 1986

Dear Mr. Wyszkowski:

Re: Part B Permit Application for AT & T Bell Laboratories, Holmdel,
Monmouth County, EPA ID No. NJD 011 328 887.

This is to advise you that the Department has completed the administrative review of your application for operation of a hazardous waste storage facility and has determined that it is in substantial compliance with the requirements of N.J.A.C. 7:26-1 et seq.

As part of the complete review process, copies of your application must also be sent to other State agencies, USEPA, and Municipal bodies for their technical review and comments. Therefore, you are hereby requested to submit nine (9) additional copies of your complete application to this Bureau of Hazardous Waste Engineering (BHWE) who will transmit them to the interested parties mentioned above. In future correspondence with you, the BHWE, as lead agency in your application review, will also address any concerns cited by other parties, in addition to any technical deficiencies that the BHWE might uncover:

The Bureau proposes the following time frames for processing your facility's application and final decision for the issuance of a permit:

1. Conduct technical review and issue notice of deficiency after receipt of administratively complete application within 90 days.
2. Determine technical completeness after receipt of all necessary information within 30 days.
3. Complete draft permit, fact sheet and public notice or application denial after technical completeness determination within 90 days.
4. Issue final permit within 75 days, if a public hearing is held within 150 days.

16 DEC 1986

This is to be used as a guidance document only. The time frames are based upon previous records but may require adjustments based on future experience.

The acceptance of this application and supporting documents for review shall not be construed as an approval of the engineering design or the completeness thereof, nor does it sanction the start-up of new operations.

By the acceptance of this application, the applicant is notified that the Division of Hazardous Waste Management has unrestricted right of entry. Any refusal by the applicant will be an automatic denial of their application.

The above requested copies of your application shall be submitted to this Bureau within twenty (20) days of the date of this letter.

If you have any questions on these matters, please contact Bob Patel of my staff at (609) 633-0736.

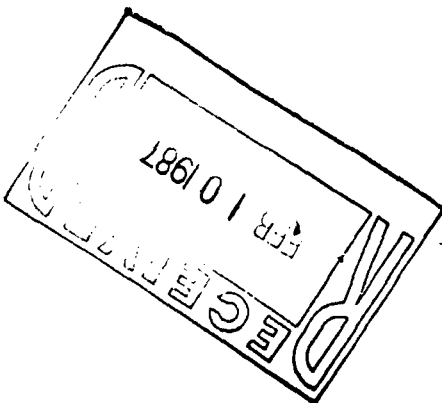
Very truly yours,

Ernest J. Kuhlwein Jr.

Ernest J. Kuhlwein, Jr., Acting Chief
Bureau of Hazardous Waste Engineering

EP9/vb

c: Angel Chang, USEPA



REFERENCE NO. 16

Let's protect our earth



13-18-05
Ron

State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT

John J. Trela, Ph.D., Acting Director
401 East State St.
CN 028
Trenton, N.J. 08625
609 - 633 - 1408

Paul E. Wyszowski, P.E.
Group Supervisor
Environmental Management Group
AT&T Bell Laboratories
600 Mountain Avenue
Murray Hill, N.J. 07974

22 MAY 1987

Dear Mr. Wyszowski:

RE: Technical Deficiencies in Part B Application for AT&T Bell Laboratories (Holmdel Site), Holmdel, Monmouth County, EPA ID No. NJD 011 328 887

Your application for the referenced hazardous waste storage facility has been reviewed by the Division of Hazardous Waste Management and all appropriate outside agencies for compliance with all applicable regulations of the New Jersey Department of Environmental Protection and the requirements of the New Jersey Hazardous Waste Regulations. It has been determined that the application is deficient in several areas and additional information will be required to make the application technically complete. The deficient items are noted and explained in the attached comment sheet.

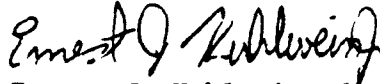
The information requested in this letter should be submitted to this Bureau within 30 days of the date of this letter. Applicable sections requiring revision shall be supplied in triplicate, otherwise discussions and clarifications need only to be provided in the transmittal letter. Technical and engineering data should be signed and sealed by a New Jersey Registered Professional Engineer. Failure to submit a timely and complete response could be cause for enforcement action and the initiation of denial procedures.

In the future, the Division may request additional information from the applicant to satisfy application requirements as necessary.

22 MAY 1987

If you have any questions regarding these matters, please contact Bob Patel of my staff at (609) 292-9880.

Very truly yours,



Ernest J. Kuhlwein, Jr., Acting Chief
Bureau of Hazardous Waste Engineering

EP9/sg

c: Lori Amato, USEPA, Region II
Denise K. Bear, BEMQA

COMMENT SHEET

Facility Name: AT&T Bell Laboratories

EPA ID Number: NJD 011 328 887

1. Provide a revised page 3 of the Part A application to include the following:
 - a. Delete X850 for Packed Laboratory Chemicals because the Waste ID Number refers to packed laboratory chemicals in over pack containers and it does not refer to the storage of small containers in a cabinet or otherwise awaiting placement in an overpack drum.
 - b. Change X386 to C386 for Polychlorinated biphenyl, N.O.S. since the Waste ID Number is adopted and listed under the "c" codes in N.J.A.C. 7:26-8.16.
 - c. List, by using appropriate "U" and "P" codes of N.J.A.C. 7:26-8.15, all raw chemicals to be stored as unwanted chemicals in the small container storage area.
 - d. List, by using appropriate "U" codes of N.J.A.C. 7:26-8.15, spent solvents to be stored in the tank.
2. Provide the following information in tabular form:
 - a. List Hazardous Waste Numbers and appropriate descriptions of wastes to be stored in tank;
 - b. List Hazardous Waste Numbers and appropriate descriptions of wastes to be stored in 55 gallon containers; and
 - c. List Hazardous Waste Numbers and appropriate descriptions of wastes to be stored in small containers.
3. Provide a detailed chemical and physical analysis of each hazardous waste code to be stored at the facility, as well as all information which must be known to store each waste properly in accordance with N.J.A.C. 7:26-9 and N.J.A.C. 7:26-10.
4. Provide information covering the types and sizes of small containers containing hazardous waste to be stored in the small container storage area.
5. Provide a detailed specification of each hazardous waste species under ID No. D003 (reactive waste) to be stored in the small container area at the facility.
6. Provide the maximum numbers and capacities of small containers to be stored in each storage room and storage cabinet to verify the adequacy of the reported secondary containment volume capacity of each reservoir.

7. Provide a detailed description of the design specification for the concentrated waste pouring station as well as a detailed description of the operating procedure for the control valve to be used for removal of accumulated spills, leakage, or accumulated precipitation from the diked area.
8. Identify the scheme and method to separate containers of incompatible wastes in the three storage devices in the small container storage area.
9. Provide a detailed description of the testing method and equipment to be used for measurements of tank wall thickness pursuant to N.J.A.C. 7:26-10.5(b)2. This information will be reviewed by the Department to verify the 5/16 inch tank wall thickness reported in the additional information submittal by the company on December 3, 1986.
10. Please note that the Department's Bureau of Environmental Measurements of Quality Assurance has not completed review of your company's waste analysis plan. Therefore, the Bureau of Hazardous Waste Engineering will request AT&T Bell Laboratories to provide additional information, if necessary, to correct any deficiency in the waste analysis plan in the near future. Such additional information will be subject to further review and approval by the Department.
11. Specify the maximum number of 55 gallon drums to be stored in the container storage area. The maximum drum volume in gallons must be a multiple of 55 gallons.
12. Provide a revised soil sampling and analysis plan to include the following items:
 - a) The plan should provide that if any visibly stained areas are encountered, they will be sampled independently of and in addition to the planned four samples;
 - b) The plan must indicate the rationale for selection of sample parameters;
 - c) The plan must include the use of a soil coring device or Ponar dredge for wet sediment sample collection. The use of a trowel is unacceptable;
 - d) The plan for decontamination of the dedicated stainless steel trowels should include laboratory cleaned and wrapped autoclaved aluminum foil;
 - e) Inner disposable gloves should be utilized for sample collection and must be changed between each sample location;
 - f) The travel blank should be originated from the laboratory in order to monitor possible contamination of sample containers;
 - g) The plan must include the use of laboratory provided analyte-free water for collection of the field blank; and

- h) AT&T Bell Laboratories must notify the Department at least two (2) weeks prior to initiation of sampling to arrange to have an auditor present, by calling Denise K. Bear of the Environmental Measurements Section at (609) 984-1693 or Bob Patel of the Bureau of Hazardous Waste Engineering at (609) 292-9880.

13. Provide a revised closure Cost Estimate to include the following items:

The Closure Cost Estimate must be based on the Rules and Regulations of the Federal Register, Vol. 51, No. 85 dated Friday, May 2, 1986, that states the Closure Cost Estimate must be based on the costs to the owner or operator of hiring a third party to close the facility. A third party is a party who is neither a parent nor a subsidiary of the owner or operator.

a) Labor Costs

- 1) Labor costs must be based on eight (8) hour day (during daylight hours) and include costs for general labor as well as costs for the supervision of labor and activities necessary for a through closure.
- 2) Labor costs must be listed and comply with the State of New Jersey, Department of Labor Prevailing Wage Determination of May, 1986.

A request for determination for specific descriptions of work may be obtained by writing to:

Public Contracts Section
Office of Wage and Hour Compliance
New Jersey Department of Labor
Trenton, N.J. 08625-0389

Note: New Jersey Department of Labor, Prevailing wage Rate Determination for Mommouth County notes that Toxic or Hazardous Wastes Laborers receive three dollars (\$3.00) per hour over their regular applicable hourly wage rate.

b) Equipment and Supplies

- 1) Material costs must be detailed on the Closure Cost Estimate to help ensure that sufficient information is included.
- 2) Costs for heavy equipment (e.g. vacuum trucks, fork lifts, etc.) together with their fuel, maintenance, operator and decontamination costs must be supplied and detailed on the Closure Cost Estimate.

c) Disposal

- 1) The Closure Cost Estimate must show a disposal cost of Thirteen Thousand Dollars (\$13,000.00) including

transportation as the cost to dispose of Six Thousand (6,000) gallons of waste solvent using the Solvent Recovery Processing Method of disposal for the waste liquid storage tank.

- 2) The Closure Cost Estimate must show a disposal cost of Two Thousand Four Hundred Eighty Nine Dollars (\$2,489.00) including transportation as the cost to dispose of Nineteen (19) drums in the Drum Storage Area using the Solvent Recovery Processing Method of disposal.
- 3) The Closure Cost Estimate must show a disposal cost of Three Hundred Fifty Dollars (\$350.00) including transportation as the cost to dispose of approximately Two (2) drums containing lab packs in the Small Container Storage Area.
- 4) Standard practice shows that ten percent (10%) of the total maximum capacity of all tanks listed in the Closure Cost Estimate must be the amount of waste wash waters disposal of during decontamination. Your revised Closure Cost Estimate must show a cost of Five Hundred Sixty Three Dollars (\$563.00) including transportation for the disposal of waste wash waters generated decontamination.

d) Additional Closure Costs

- 1) Costs for sampling and analysis of waste, solid, etc. as well as the waste wash waters must be included in your revised Closure Cost Estimate and the analysis must be completed by an independent State of New Jersey certified testing laboratory.
- 2) Contingency costs of 20% must be included in the Closure cost Estimate to cover the unanticipated spills, adverse weather conditions, etc. encountered during closure.
- 3) Administrative costs of 10% must be included in the Closure Cost Estimate to cover the costs of bookkeeping, taxes, etc.

- e) All other itemized costs listed in subject company's Closure Cost Estimate must remain and be incorporated in your next Closure Cost Estimate submittal.

EP9/sg

REFERENCE NO. 17



State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT

Michèle M. Putnam
Deputy Director

John J. Trela, Ph.D., Director
401 East State St.

Lance R. Miller
Deputy Director

Hazardous Waste Operations

CN 028
Trenton, N.J. 08625
(609)633-1408

Responsible Party Remedial Action

Paul E. Wyszowski, P.E.
Group Supervisor
Environmental Management Group
AT&T Bell Laboratories
600 Mountain Avenue
Murray Hill, NJ 07974

JUN 08 1988

Dear Mr. Wyszowski:

RE: Technical Completeness of Part B Permit Application for AT&T Bell Laboratories (Holmdel Site), Holmdel, Monmouth County, EPA ID NO. NJD 011 328 887

The Bureau of Hazardous Waste Engineering (the "Bureau") acknowledges receipt of your August 27, 1987 response to the Bureau's May 22, 1987 Notice of Deficiency.

After review of the additional information submitted by AT&T Bell Laboratories, the Bureau has concluded that the Part B permit application for the referenced facility can be considered technically complete.

As part of the permit issuance procedure, a draft permit, fact sheet and public notice are being prepared by the Bureau.

AT&T Bell Laboratories will be informed at a later date if any additional information is required for the Part B application to complete the preparation of the draft permit.

JUN 08 1988

If you have any questions concerning this matter, please contact
Bob Patel at (609) 292-9880.

Very truly yours



Ernest J. Kuhlwein, Jr., Chief
Bureau of Hazardous Waste Engineering

EP9/slw

c: Barry Tornick, USEPA
Vince Krisak, Bureau of Field Operations
Milton Polakovic, Bureau of Technology and Engineering
Barry Chalofsky, Division of Water Resources
Honorable Frank Tricarico, Mayor, Township of Holmdel
Lawrence Zaayenga, Solid Waste Coordinator - Monmouth County
Planning Board
Robert Berg, Bureau of Ground Water Quality Management

DOCUMENT: AT&T3
FOLDER: SLWMCB

REFERENCE NO. 18

DIVISION OF HAZARDOUS WASTE MANAGEMENT
HAZARDOUS WASTE INSPECTION REPORT

DWM-029

HAZARDOUS WASTE MANAGEMENT FACILITY INSPECTION REPORT

FACILITY INFORMATION

FACILITY NAME: AT&T Bell Labs.

FILE NUMBER: _____

VHT FACILITY FILE NUMBER: _____

PERMIT #: _____

REGION: _____

INSPECTION DATE: 08-18-88

INCIDENT/CASE NUMBER: _____

INSPECTION TYPE: G TSD RCRA

RESPONSIBLE AGENCY CODE: _____

INSPECTOR'S NAME: Peter Maruhn

INSPECTOR'S AGENCY: DEP

INSPECTOR'S BUREAU: Field Operations

EPA ID NUMBER: NJD011328887

ADDRESS: Crawfords Corner Rd

Holmdel NJ 07733

LOT: 38 BLOCK: 11

COUNTY: Monmouth

FACILITY PERSONNEL: Edward Nowak Env. Mng. Sp.

TELEPHONE #: David Cesario Env. Fac. Mgr
(201) 564-2645

OTHER STATE/EPA PERSONNEL: _____

REPORT PREPARED BY: Peter Maruhn

REVIEWED BY: Linda Z. [Signature]

DATE OF REVIEW: 9-27-88

PHOTOS TAKEN: () YES (✓) NO

SAMPLE TAKEN: () YES (✓) NO

If yes, how many?

NO. OF SAMPLES: _____ NJDEP ID #: _____

MANIFESTS REVIEWED: (✓) YES () NO

Number of Manifests in Compliance: A77

Number of Manifests Not in Compliance: None

List Manifest Document Numbers of Those Manifests Not in Compliance:

SUMMARY OF FINDINGS

FACILITY DESCRIPTION AND OPERATIONS

The present modern building of AT & T Bell Labs at Crawford Corner Rd in Holmdel was first occupied in 1962. It has three stories, over one million square feet of floor space and between six and seven thousand workers. They claim this facility is the largest of it's kind in the world. Their only activity is applied research and development in the area of telecommunications. They work on developing micro chips, crystals, printed circuits and computer software. Their Draft Permit is up for Public Comment beginning August 21, 1988 and ending Oct 6, 1988. Public Hearing will be held at 1900 hrs Sept 21, 1988.

Inspection of the waste storage area showed that AT & T is in compliance with conditions of the draft permit with respect to the 6000 gal vaulted tank, drum storage area and cabinets housing small containers. The permit allows receiving and storing small containers on-site from company-owned off-site locations which are small quantity generators. They transport their wastes using their own vehicle and have a Solid Waste Permit No. NJ SW 12.11 HA. No hazardous wastes are disposed of on site.

Describe the activities that result in the generation of hazardous waste.

Hazardous wastes are generated from communication related research and development activities. Rinse waters and other aqueous hazardous wastes are stored in one vaulted 6000 gal tank. Spent etching solutions, waste paint thinner and spirit solvents are stored in 55 gallon drums. Small containers of lab wastes are stored in steel cabinets.

Identify the hazardous waste located on site, and estimate the approximate quantities of each. (Identify Waste Codes).

4500 gal in 6000 gal tank (Last emptied 10-23-85)
Rinse waters, other mixed aqueous wastes X900
2 x 55 gal drums Mixed solvents F001
1 x 55 gal drum Flammable liquid D001
1 x 55 gal drum Flammable liquid F003
3 x 55 gal drums Corrosive D002
6 x 55 gal containers Waste ammonium hydroxide D002

HAZARDOUS WASTE FACILITY STANDARDSYES NO N/A

MANIFESTS

7:26-7.4(a)4	Does each manifest have the following information? Please circle the elements missing and obtain a copy of the incomplete manifests. (List those manifests that are deficient on G-1).	___	___	___
7:26-7.4(a)4i	The generator's name, address and phone number.	✓	___	___
7:26-7.4(a)4ii	The generator's EPA ID number.	✓	___	___
7:26-7.4(a)4iii	The hauler(s) name, address phone number and NJ registration.	✓	___	___
7:26-7.4(a)4iv	The hauler(s) EPA ID number.	✓	___	___
7:26-7.4(a)4v	The name, address and phone number of the designated TSD facility.	✓	___	___
7:26-7.4(a)4vi	The TSF's EPA ID number.	✓	___	___
7:26-7.4(a)4v	The name, address and phone number of the designated TSD facility.	✓	___	___
7:26-7.4(a)4vii	The name, type and quantity of hazardous waste being shipped, including such particulars as may be required regarding same?	✓	___	___
7:26-7.4(a)4viii	Special handling instructions and any other information required on the form to be shipped by generator?	✓	___	___

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-7.4(3)	Did the generator describe all N.O.S. wastes in Section J?	✓	—	—
7:26-7.4(a)ix	When shipping hazardous waste to a waste reuse facility does the generator enter the waste reuse facility I.D. # in the section G of the Uniform Manifest?	—	—	✓
7:26-7.4(a)5	Before allowing the manifested waste to leave the generator's property, did the generator:	—	—	—
7:26-7.4(a)5i	Sign the manifest certification by hand?	✓	—	—
7:26-7.4(a)5ii	Obtain the handwritten signature of the initial transporter and date of acceptance on the manifest?	✓	—	—
7:26-7.4(a)5iii	Retain one copy and forward one copy to the state of origin and one copy to the state of destination?	✓	—	—
7:26-7.4(a)5iv	Provide the required numbers of copies for: generator, each hauler, owner/operator of the designated facility, as well as one copy returned to the generator by the facility owner/operator?	✓	—	—
7:26-7.4(a)5v	Give the remaining copies of the manifest form to the hauler?	✓	—	—
7:26-7.4(f)	Has the generator maintained facility records for three (3) years? (Manifest(s), exception report(s) and waste analysis)	✓	—	—
7:26-7.4(h)1	Has the generator received signed copies of portion B (from the TSD facility) of all manifests for waste shipped off site more than 35 days ago?	✓	—	—
7:26-7.4(h)1	If not: Did the generator contact the hauler and/or the owner or operator of the TSDF and the NJDEP at (609) 292-8341 to inform the NJDEP of the situation?	—	—	✓
7:26-7.4(h)2	Have exception reports been submitted to the Department covering any of these shipments made more than 45 days ago?	—	—	✓

7:26-9.4(b)

Waste Analysis

7:26-9.4(b)11

Is there a detailed chemical and physical analysis of a representative sample of the waste(s) or each waste? (At a minimum, this analysis must contain all the information necessary for proper treatment storage or disposal of the waste).

✓ — —

7:26-9.4(b)1111

Does the character of the waste handled at the facility change from day to day, week to week, etc., thus requiring frequent testing? Check only one:

— — —

Waste characteristics vary: —

All waste(s) are basically the same: —

Company treats all waste(s) as hazardous: ✓

7:26-9.4(b)2

Is there a written waste analysis plan at the facility?

✓ — —

Does it contain:

7:26-9.4(2)1

Parameters for which each hazardous waste stream will be analyzed including constituents listed in NJAC 7:26-8.16 and the rationale for the selection of these parameters?

✓ — —

7:26-9.4(b)211

The test methods which will be used to test for these parameters?

✓ — —

7:26-9.4(b)2111

The sampling method which will be used to obtain a representative sample of the waste to be analyzed?

✓ — —

7:26-9.4(b)21v

The frequency with which the initial analysis of the waste will be reviewed or repeated to ensure that the analysis is accurate and up-to-date?

✓ — —

7:26-9.4(b)2v

For off-site facilities, the waste analysis that hazardous waste generators have agreed to supply?

✓ — —

7:26-9.4(b)2v11

Procedures which will be used to identify changes in waste stream characteristics?

✓ — —

Does hazardous waste come to this facility from an outside source? (e.g., another generator).

✓ — —

If yes, list the name(s) of generators.

From company-owned locations

YES NO N/A

7:26-9.4(b)4

If waste comes from an outside source, are there procedures in the waste analysis plan to insure that waste received conforms to the accompanying manifest?

MANIFEST
Not required

— — —

Does the plan describe:

7:26-9.4(b)4i

The procedures which will be used to determine the identity of each shipment of waste managed at the facility?

— — — ✓

7:26-9.4(b)4ii

The sampling method which will be used to obtain a representative sample of the waste to be identified, if the identification method includes sampling?

— — — ✓

7:26-9.4(c)1

Did the facility accept hazardous waste which it is not authorized to handle?

— — — ✓

7:26-9.4(i)

Are all records and results of waste analysis performed pursuant to NJAC 7:26-9.4(b) and 9.4(e) as applicable written in the operating log?

— — — ✓

7:26-9.4(h)

Security

Does the facility have:

7:26-9.4(h)1i

A 24 hour surveillance system which continuously monitors and controls entry onto the active portion of the facility?

— — — ✓

7:26-9.4(h)1ii

An artificial or natural barrier, which completely surrounds the active portion of the facility; and a means to control entry, at all times, through the gates or other entrances to the active portion of the facility?

— — — ✓

7:26-9.4(h)3

Are there "Danger-Unauthorized Personnel Keep Out" signs posted at each entrance to the facility?

— — — ✓

If no, explain what measures are taken for security.

7:26-9.4(f)

General Inspection Requirements

7:26-9.4(f)1

Does the owner or operator inspect the facility for malfunctions and deterioration, operator errors and discharges which may be causing, or may lead to:

7:26-9.4(f)1i

Discharge of hazardous waste constituents to the environment?

✓
— — —

7:26-9.4(f)1ii

A threat to human health?

✓
— — —

7:26-9.4(f)3

Has the owner or operator developed, and does the owner or operator follow a written schedule for inspecting monitoring equipment, safety and emergency equipment, security devices, and operating and structural equipment that are utilized for the prevention, detection or response to environmental or human health?

✓
— — —

7:26-9.4(f)3i

Did the owner or operator submit the written inspection schedule to the department?

✓
— — —

If yes, when was it submitted?

with Part B
— — —

7:26-9.4(f)3iii

Is the written inspection schedule kept at the facility?

✓
— — —

7:26-9.4(f)3iv

Does the schedule identify the types of problems to be looked for during the inspection?

✓
— — —

7:26-9.4(f)3v

Does the schedule include the frequency of inspection, based upon the rate of possible deterioration of the equipment and the probability of an environmental, or human health incident if the deterioration or malfunctions or any operator error goes undetected between inspections?

✓
— — —

7:26-9.4(f)5

Is there evidence that problems reported in the inspection log have not been remedied?

— ✓ —

7:26-9.4(f)6

Does the owner/operator record inspections in a log?

✓
— — —

		YES	NO	N/A
7:26-9.4(f)6	Are these records kept for at least three (3) years from the date of inspection?	✓	—	—
7:26-9.4(f)6	Does the records include the date, and time of the inspection, the name of the inspector, a notation of the observations made, and the date and nature of any repairs or other remedial action?	✓	—	—
7:26-9.4(g)	<u>Personnel Training</u>			
	Have facility personnel successfully completed a program of classroom instruction or on-the-job training within six months of having been employed?	✓	—	—
7:26-9.4(g)2	Is the program directed by a person trained in hazardous waste management procedures and does it include instruction which teaches facility personnel hazardous waste management procedures (including contingency plan implementation) relevant to the positions in which they are employed?	✓	—	—
7:26-9.4(g)3	If yes, have facility personnel taken part in an annual review of training?	✓	—	—
	Is there written documentation of the following:	—	—	—
7:26-9.4(g)61	Job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job?	✓	—	—
7:26-9.4(g)611	A written job description for each position related to hazardous waste management?	✓	—	—
7:26-9.4(g)6111	A written description of the type and amount of both introductory and continuing training given to personnel in jobs related to hazardous waste management?	✓	—	—
7:26-9.4(g)6iv	Documentation of actual training or experience received by personnel?	✓	—	—

7:26-9.4(g)7	Are training records kept on all current employees until closure of the facility and training records kept on former employees for three years from their last date of employment?	✓	—	—
7:26-9.4(g)8	Are semi-annual drills conducted involving all employees and appropriate local authorities to test emergency response capabilities at the facility in accordance with the contingency plan and emergency procedures development pursuant to NJAC 7:26-9.7?	✓	—	—
7:26-9.6	<u>Preparedness and Prevention</u>			
	Does the facility comply with preparedness and prevention requirements including maintaining:			
7:26-9.6(b)1	An internal communications or alarm system?	✓	—	—
7:26-9.6(b)2	A telephone or other device to summon emergency assistance from local authorities?	✓	—	—
7:26-9.6(b)3	Portable fire equipment, spill control equipment, and decontamination equipment?	✓	—	—
7:26-9.6(b)4	Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems?	✓	—	—
7:26-9.6(c)	Is equipment tested and maintained?	✓	—	—
7:26-9.6(d)1	Is there immediate access to communications or alarm systems during handling of hazardous waste?	✓	—	—
7:26-9.6(e)	Adequate aisle space to allow unobstructed movement of personnel fire protection equipment, spill control equipment and decontamination equipment?	✓	—	—
	If no, please explain.			

In your opinion, do the types of waste on site require all of the above procedures, or are some not required?

✓

Explain.

7:26-9.6(f)

Has the facility made the following arrangements, as appropriate for the type of waste handled on site?

7:26-9.6(f)1

Familiarize police, fire departments and emergency response teams with the layout of the facility and hazardous waste handled?

✓

7:26-9.6(f)2

Where more than one police and fire department might respond to an emergency, is there an agreement designating primary emergency authority to a specific police or fire department, and agreements with any others to provide support to the primary emergency authority?

✓

7:26-9.6(f)3

Agreements with emergency response contractors, and equipment suppliers?

✓

7:26-9.6(f)4

Arrangements to familiarize local hospitals with the properties of hazardous waste handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or discharges at the facility?

✓

7:26-9.6(f)5

Arrangements with local fire departments to inspect the facility on a regular basis with at least two inspections annually?

✓

7:26-9.7

Contingency Plan and Emergency Procedures

7:26-9.7(a)

Does the facility have a written contingency plan for emergency procedures designed to deal with fires, explosions, hazards to human health or environment, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil or surface water?

✓

- 7:26-9.7(b) Are provisions of the plan carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment? ☒ ☐ ☐
- 7:26-9.7(c) Does the contingency plan describe the actions facility personnel shall take in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility? ☒ ☐ ☐
- 7:26-9.7(d) Did the owner or operator prepare a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112 or 151 or a Discharge Prevention, Containment and Countermeasure (DPCC) Plan in accordance with NJAC 7:1E-4.1 et seq.? ☒ ☐ ☐
- If yes, did the owner or operator amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of this section? ☒ ☐ ☐
- 7:26-9.7(e) Does the plan describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and state and local emergency response teams to coordinate emergency services? ☒ ☐ ☐
- 7:26-9.7(f) Does the plan list names, addresses, and phone numbers (office and home) of all persons qualified to act as emergency coordinator and is this list kept up-to-date? Where more than one person is listed, one shall be named as primary emergency coordinator and others shall assume responsibility as alternates? ☒ ☐ ☐

7:26-9.7(g)

Does the plan include a list of all emergency equipment at the facility (such as fire extinguishing systems, spill control equipment, communications and alarm systems (internal and external), and decontamination equipment), where this equipment is required? Is the list kept up-to-date? In addition, does the plan include the location and a physical description of each item on the list, and a brief outline of its capabilities?

✓

7:26-9.7(h)

Does the plan include an evacuation procedure for facility personnel where there is a possibility that evacuation could be necessary? Does this plan describe signal(s) to be used to begin evacuation, evacuation routes, and alternative evacuation routes (in cases where the primary routes could be blocked by releases of hazardous waste or fires)?

✓

7:26-9.7(i)

Is a copy of the contingency plan and all revisions to the plan:

1. Maintained at the facility; and
2. Has the contingency plan been submitted to local authorities (police, fire departments, emergency response teams)?

✓

✓

7:26-9.7(k)

Is there at least one employee on site or on call with the responsibility of coordinating all emergency response measures?

✓

7:26-9.8

Closure Plan

7:26-9.8(c)

Does the facility have a written closure plan?

✓

Does the owner/operator keep a written copy of the closure plan and all revisions to the plan at the facility?

✓

If yes, does the plan include:

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.8(e)11	A description of how and when the facility will be partially closed (if applicable) and ultimately closed?	✓	—	—
7:26-9.8(e)111	The maximum extent of the operation which will be open during the life of the facility?	✓	—	—
7:26-9.8(e)2	An estimate of the maximum inventory of wastes in storage or in treatment at any given time during the life of the facility?	✓	—	—
7:26-9.8(e)3	A description of the steps needed to decontamination facility equipment during closure?	✓	—	—
7:26-9.8(e)4	A schedule for final closure including the anticipated date when the wastes will no longer be received, the date when completion of final closure is anticipated, and intervening milestone dates which will allow tracking of the progress of closure?	✓	—	—
	<u>Post Closure Plan</u>			
7:26-9.9(g)	Does the facility have a written post-closure plan kept at the facility?	—	✓	—
	If yes, does the plan:			
7:26-9.9(i)	Identify the activities which will be carried on after closure and the frequency of these activities?	—	—	—
7:26-9.9(i)1	Include a description of the planned ground water monitoring activities and frequencies at which they will be performed?	—	—	—
7:26-9.9(i)2	Include a description of the planned maintenance activities, and frequency at which they will be performed, to insure the following:	—	—	—
7:26-9.9(i)21	The integrity of the cap and final cover or other containment structures where applicable?	—	—	—
7:26-9.9(i)211	Describe the function of the facility monitoring equipment?	—	—	—

7:26-9.9(i)3

Include the name, address and phone number of a person or office to contact about the disposal facility during the post-closure period?

Does the owner/operator have a written estimate of the cost of post-closure for the facility?

If yes, what is it?

Please circle all appropriate activities and answer questions in appropriate sections all activities circled.

Storage	Treatment	Disposal
<u>Container</u>	Tank	Landfill
<u>Tank, Above Ground</u>	Surface Impoundments	
Tank, Below Ground	Incineration	Surface Impoundments
Surface Impoundments	Thermal Treatment	Other _____
Waste Piles		
Other _____	Chemical, Physical and Biological Treatment	
Other _____		

7:26-9.4(d)

Containers

What type of containers are used for storage? Describe the size, type, quantity and nature of wastes (e.g., 12 fifty-five gallon drums of waste acetone).

See page 2

7:26-9.4(d)11

Do the containers appear to be of sturdy leakproof construction of adequate wall thickness, weld, hinge and seam strength, and of sufficient material strength to withstand side and bottom shock, while filled, without impairment of the container's ability to contain hazardous waste?

If no, explain.

YES NO N/A

7:26-9.4(d)1ii	Are the lids, caps, hinges or other closure devices of sufficient strength that when closed, they will withstand dropping, overturning or other shock without impairment of the container's ability to contain hazardous waste?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(d)2	Do the containers appear to be in good condition, not in danger of leaking?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)2	If not, please describe the type, condition and number of leaking or corroded containers. Be detailed and specific.			
7:26-9.4(d)3	Are hazardous wastes stored in containers made of compatible materials?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)4i	Are all containers securely closed, except those in use, so that there is no escape of hazardous waste or its vapors?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(d)4iii	Do containers appear to be properly opened, handled or stored in a manner which will minimize the risk of the container rupturing or leaking?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(d)4iv	Are containerized hazardous wastes segregated in storage by waste type?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)4v	Are containerized hazardous wastes arranged so that their identification label is visible?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)5	Does the owner/operator inspect the container storage area at least daily, looking for leaks and for deterioration caused by corrosion or other factors?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)6	Are containers holding ignitable and reactive waste located at least 50 feet (15 meters) away from the facility's property line?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

7:26-9.4(d)7i	Are incompatible wastes, or incompatible wastes and materials placed in the same container?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If yes, explain.			
7:26-9.4(d)7ii	Are hazardous wastes placed in unwashed containers that previously held incompatible wastes?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If yes, explain.			
7:26-9.4(d)7iii	Are containers holding hazardous waste that are incompatible with any waste or other materials stored nearby in other containers, open tanks, or surface impoundments separated from the other materials or protected from them by means of a dike, berm, wall or other device?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)1i	Are ignitable, reactive or incompatible wastes protected from sources of ignition or reaction?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(e)1ii	Does the owner/operator confine smoking and open flames to specially designated locations when ignitable or reactive wastes are being handled?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(e)1iii	Does the owner/operator conspicuously place "No Smoking" signs whenever there is a hazard from ignitable or reactive waste?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If the treatment, storage or disposal of ignitable or reactive waste, and the mixture of incompatible wastes and materials, conducted so that it does not:			
7:26-9.4(e)2i	Generate extreme heat or pressure, fire or explosion, or violent reaction?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)2ii	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

7:26-9.4(e)2iii	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)2iv	Damage the structural integrity of the device or facility containing the waste?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(e)2v	Threaten human health or the environment?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

7:26-11.2

Tanks

What are the approximate number and size of tanks containing hazardous waste?

1 x 6000 gal

Identify the waste treated (stored) in each tank.

Aqueous solution
of EP toxic waste
containing arsenic
mercury & lead.

General Operating Requirements

7:26-11.2(a)2

Are hazardous wastes or treatment reagents placed in the tank that could cause the tank or its inner liner to rupture, leak or corrode?

Tank is teflon
lined. ☒

If yes, please explain.

Are there leaking tanks?

☐ ☒ ☐

7:26-11.2(a)2

Are all hazardous wastes or treatment reagents being placed in tanks compatible with the tank material so that there is no danger of ruptures, corrosion, leaks or other failures?

☒ ☐ ☐

7:26-11.2(3)

Do uncovered tanks have at least two feet of freeboard or an adequate containment structure?

☐ ☐ ☒

7:26-11.2(a)4

If waste is continuously fed into a tank, is the tank equipped with a means to stop the inflow from the tank, e.g., bypass system to a standby tank?

Not needed.
Tank hand
filled. ☐

7:26-11.2(c)

Inspections

Is the tank(s) inspected for:

1. Discharge control equipment (each operating day).

☒ ☐ ☐

YES NO N/A

	2. Monitoring equipment (each operating day).	✓	—	—
	3. Level of waste in tank (each operating day).	✓	—	—
	4. Construction of materials of the tank (weekly).	✓	—	—
	5. Are the tanks and surrounding areas (e.g., dike) inspected weekly for leaks, corrosion or other failures (weekly)?	✓	—	—
7:26-11.2(e)	Are ignitable or reactive wastes stored in a manner which protects them from a source of ignition or reaction?	Not ignitable	✓	—
	If no, please explain.			
7:26-11.2(f)	Does it appear that incompatible wastes are being stored separate from each other?	✓	—	—
7:26-9.2(b)	Are there underground tanks used to store hazardous waste?	—	✓	—
	If yes, how many and can they be entered for inspection?	—	—	✓
	Has the underground tank been in use on or before November 19, 1980? Specify Date.	—	—	✓
	If no, when was the tank placed in use?			
7:26-9.2(b)31	Does the facility have a ground water monitoring plan approved by the department?	—	—	✓
7:26-9.2(b)311	Is the use of the tank specified to the manufacturers recommended lifetime?	—	—	✓
7:26-11.3	<u>Surface Impoundments</u> N/A			
	Describe the design and operating features of the surface impoundment to prevent ground water contamination (e.g., liner leachate collection system).			
	Give the approximate size of surface impoundments (gallons or cubic feet). Please specify the types of waste stored and treated.			

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.3(a)	Is there at least two feet of freeboard in the impoundment?	—	—	—
7:26-11.3(b)	Do all earthen dikes have a protective cover to preserve their structural integrity?	—	—	—
	If yes, please specify the type of covering.			
7:26-9.4(c)1	Does the owner/operator have a detailed chemical and physical analysis of a representative sample of the waste in the impoundment?	—	—	—
7:26-9.4(i)	Does the owner/operator place the results from each waste analysis and trial test, or the documented information, in the operating record of the facility?	—	—	—
7:26-11.3(d)	Does the owner or operator inspect:			
7:26-11.3(d)1	The freeboard level at least once each operating day to ensure compliance with subsection 11.3(a)?	—	—	—
7:26-11.3(d)2	The surface impoundment, including dikes and vegetation surrounding the dike, at least once a week to detect any leaks, deterioration or failures in the impoundment?	—	—	—
7:26-11.3(f)	Is ignitable or reactive waste placed in the surface impoundment?	—	—	—
7:26-11.3(f)1	If yes, is the waste treated, rendered, or mixed before or immediately after placement in the impoundment?	—	—	—
7:26-11.3(f)11	Does the resulting waste, mixture, or dissolution of material no longer meet the definition of ignitable or reactive waste?	—	—	—

7:26-11.3(f)111	Is the waste treated, rendered or mixed so that it does not:			
7:26-9.4(e)21	Generate extreme heat or pressure, fire or explosion, or violent reaction?	—	—	—
7:26-9.4(e)211	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	—	—	—
7:26-9.4(e)2111	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	—	—	—
7:26-9.4(e)21v	Damage the structural integrity of the device or facility containing the waste?	—	—	—
7:26-9.4(e)2v	Threaten human health or the environment?	—	—	—
7:26-11.3(f)2	Is the surface impoundment used solely for emergencies?	—	—	—
7:26-11.3(g)	Are incompatible wastes, or incompatible wastes and materials placed in the same surface impoundment?	—	—	—
	If yes, is the waste managed so that it does not:			
7:26-9.4(e)21	Generate extreme heat or pressure, fire or explosion, or violent reaction?	—	—	—
7:26-9.4(e)211	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	—	—	—
7:26-9.4(e)2111	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	—	—	—
7:26-9.4(e)21v	Damage the structural integrity of the device or facility containing the waste?	—	—	—
7:26-9.4(e)2v	Threaten human health or the environment?	—	—	—
7:26-11.4	<u>Landfills</u> N/A			
	Identify the types of waste and size of the landfill.			
	<u>General Operating Requirements</u>			
7:26-11.4(a)1	Is run-on diverted away from all portions of the landfill?	—	—	—

YES NO N/A

7:26-11.4(a)2

Is runoff from active portions of the landfill collected?

— — —

7:26-11.4(a)3

Is waste which is subject to wind dispersal controlled?

— — —

Please explain how.

7:26-11.4(a)4

Does waste disposal or the disposal operation occur within 200 feet (60.6 meters) of the property boundary?

— — —

7:26-11.4(a)6

Are untreated, ignitable, or reactive wastes placed in the landfill?

— — —

If yes, explain.

7:26-11.4(a)7

Are incompatible wastes, or incompatible wastes and materials placed in the same hazardous waste landfill cell?

— — —

If yes, explain.

7:26-11.4(a)8

Are bulk or non-containerized liquid waste or waste containing free liquids placed in a hazardous waste landfill?

— — —

If yes:

7:26-11.4(a)8i

Does the hazardous waste landfill have a liner which is chemically and physically resistant to the added liquid and a functioning leachate collection and removal system with a capacity sufficient to remove all leachate produced?

— — —

7:26-11.4(a)8ii

Before disposal, is the liquid waste or waste containing free liquids treated or stabilized, chemically or physically, so that free liquids are no longer present?

— — —

7:26-11.4(a)9

Are containers holding liquid waste or waste containing free liquids placed in a hazardous waste landfill?

— — —

If yes:

7:26-11.4(a)9i

Is the container designed to hold liquids or free liquids for a use other than storage, such as a battery?

— — —

7:26-11.4(a)9i1	Is the container very small, such as an ampule?	___	___	___
7:26-11.4(a)10	Are empty containers crushed flat, shredded, or similarly reduced in volume before it is buried beneath the surface of a hazardous waste landfill?	___	___	___
7:26-11.4(a)11	Does the owner or operator of a hazardous waste landfill continue to dispose of hazardous wastes subsequent to the detection of any liquid, in the secondary collection system?	___	___	___
7:26-11.4(b)	Does the owner or operator of a hazardous waste landfill maintain an operating record required in NJAC 7:26-9.4(i)?	___	___	___
7:26-11.4(b)1	Does the owner/operator maintain a map, the exact location and dimensions, including depth of each cell with respect to permanently surveyed bench marks?	___	___	___
7:26-11.4(b)2	The contents of each cell and the appropriate location of each hazardous waste type within each cell?	___	___	___
	Are containers holding liquid waste or waste containing free liquids placed in the landfill?	___	___	___
	Please describe the types and contents of such containers placed in the landfill.			
	Are empty containers placed in the landfill crushed flat, shredded or similarly reduced in volume before they are buried?	___	___	___
	Are small containers of hazardous waste in overpacked drums placed in the landfill?	___	___	___
	If yes, please describe precautions taken to prevent the release of the waste.			
7:26-11.5	<u>Incinerator</u> N/A			
	What type of incinerator is at the site (e.g., waterwall incinerator, boiler, fluidized bed, etc.).			

Is the residue from the incinerator a hazardous waste?

— — —

What types of air pollution control devices (if any) are installed in the incinerator unit?

Is energy recovered from the process?

— — —

If yes, describe.

What is the destruction and removal efficiency for the organic hazardous waste constituents?

7:26-11.5(b)1

Does the operating record include additional analysis and to determine types of pollutants which might be emitted including:

7:26-11.5(b)11

Heating value of the waste?

— — —

7:26-11.5(b)111

Halogen and sulfur content?

— — —

7:26-11.5(b)1111

Concentrations of lead and mercury?

— — —

7:26-11.5(2)

If no to any of the above questions, is there justification and documentation?

— — —

If operating, does it appear the incinerator is operating at steady state for conditions of operation, including temperature and air flow?

— — —

Monitoring and Inspection

7:26-11.5(c)1

Are existing instruments relating to combustion and emission controls monitored every 15 minutes?

— — —

If no, explain.

7:26-11.5(c)1

Does the incinerator have all the following instruments for measuring: Wastefeed, auxiliary fuel feed air flow, incinerator temperature scrubber flow, and scrubber pH? (Circle Missing Instruments).

— — —

If no, explain.

7:26-11.5(c)2

Is the stack plume observed visually at least hourly for opacity and color?

— — —

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-11.5(c)3	Are there any signs of leaks, spill and fugitive emission associated with the pumps, valves, conveyors, pipes, etc.?	—	—	—
	If yes, describe.			
7:26-11.5(c)3	Are all emergency shutdown controls and system alarms checked to assure proper operation?	—	—	—
	Is there any reason to believe the incinerator is being operated improperly? i.e., steady state conditions are not maintained.	—	—	—
	If yes, explain.			
7:26-11.5(c)3	Is the incinerator inspected daily?	—	—	—
7:26-11.6	<u>Thermal Treatment</u> N/A			
	What type of thermal treatment is at the site (e.g., waterwall incinerator, boiler, fluidized bed, etc.).			
	List the types and quantities of hazardous waste thermally treated.			
	Is the residue from the thermal treatment unit a hazardous waste?	—	—	—
	What types of air pollution control devices (if any) are installed in the thermal treatment unit?			
	Is energy recovered from the process?	—	—	—
	If yes, describe.			
	What is the destruction and removal efficiency for the organic hazardous waste constituents?			
7:26-11.6(b)1	Does the operating record include additional analysis and to determine types of pollutants which might be emitted including:			
7:26-11.6(b)11	Heating value of the waste?	—	—	—
7:26-11.6(b)111	Halogen and sulfur content?	—	—	—
7:26-11.6(b)1111	Concentrations of lead and mercury?	—	—	—

7:26-11.6(2)

If no to any of the above questions,
is there justification and documentation? _____

If operating, does it appear the
thermal treatment unit is operating
at steady state for conditions of
operation, including temperature
and air flow? _____

Monitoring and Inspection

Are existing instruments relating to
combustion and emission controls
monitored every 15 minutes? _____

If no, explain.

7:26-11.6(c)1

Does the thermal treatment have all
the following instruments for
measuring: Wastefeed, auxiliary
fuel feed air flow, incinerator
temperature scrubber flow, and
scrubber pH? (Circle Missing
Instruments). _____

If no, explain.

7:26-11.6(c)2

Is the stack plume observed visually
at least hourly for opacity and color? _____

7:26-11.6(c)3

Are there any signs of leaks, spills
and fugitive emission associated with
the pumps, valves, conveyors, pipes, etc? _____

If yes, describe.

7:26-11.6(c)3

Are all emergency shutdown controls
and system alarms checked to assure
proper operation? _____

Is there any reason to believe the
thermal treatment unit is being
operated improperly? i.e., steady
state conditions are not maintained. _____

If yes, explain.

7:26-11.6(c)3

Is the thermal treatment inspected daily? _____

7:26-11.6(e)

Is there open burning of hazardous waste? _____

If yes, what is being burned? (Only
burning or detonation of explosives is
permitted).

If open burning or detonation of explosives is taking place, approximately what is the distance from the open burning or detonation to the property of others?

7:26-11.7

Chemical, Physical and Biological Treatment

N / A

(Other than in tanks, surface impoundments or plant treatment facilities).

Describe the treatment system at this facility and the types of wastes treated.

7:26-11.7(a)2

Does the treatment process system show any signs or ruptures, leaks or corrosion?

If yes, describe.

7:26-11.7(a)3

Is there a means to stop the inflow of continuously fed hazardous wastes?

Inspections

7:26-11.7(c)1

Is the discharge control safety equipment (e.g., waste feed cut-off systems, bypass systems, drainage systems and pressure relief systems) in good working order?

7:26-11.7(c)1

Are they inspected at least once each operation day?

7:26-11.7(c)2

Does the data gathered from the monitoring equipment (e.g., pressure and temperature gauges) show treatment process is operating according to design?

7:26-11.7(c)2

Is data gathered at least once each operating day?

7:26-11.7(c)3

Are construction materials of the treatment process inspected at least weekly to detect corrosion or leaking of fixtures and seams?

7:26-11.7(c)4

Are the discharge confinement structures (e.g., dikes) immediately surrounding the treatment unit inspected at least weekly to detect erosion or obvious signs of leakage (e.g., wet spots or dead vegetation).

7:26-11.7(e)1

Are ignitable or reactive waste fed into the waste treatment system treated or protected from any material or conditions which may cause it to ignite or react?

If yes, explain how.

7:26-11.7(f)

Are the incompatible wastes placed in the same treatment process?

If yes, please explain.

7:14A-6

Ground Water Monitoring

N/A

(Applies only to: Surface impoundments, landfills, land disposal facilities).

7:14A-6.2

Does the owner/operator have a ground water monitoring plan approved by the department and capable of determining the facility's impact on the quality of ground water?

If no, please explain.

How many monitoring wells has the facility installed?

What is the depth to ground water?

How many deep monitoring wells are on site? (Indicate depth of monitoring wells).

How many shallow monitoring wells are on site? (Indicate depth of monitoring wells).

7:14A-6.3(a)

Is the ground water monitoring system capable of yielding ground water samples for analysis?

If no, please explain.

7:14A-6.3(a)1

Are monitoring wells installed hydraulically upgradient?

If yes, specify how many and the depth of each.

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:14A-6.3(a)2	How many monitoring wells are installed hydraulically downgradient?	—	—	—
	If yes, specify how many and the depth of each.			
7:14A-6.4(a)	Does the owner/operator have a ground water sampling and analysis plan?	—	—	—
	If no, please explain.			
7:14A-6.4(a)	Does the plan include procedures and techniques for:			
	1. Sample Collection	—	—	—
	2. Sample Preservation and Shipment	—	—	—
	3. Analytical Procedures	—	—	—
	4. Chain of Custody	—	—	—
	List the types and quantities of hazardous waste incinerated.			
7:26-9.4(b)3	Did the owner or operator submit the waste analysis plan to the Department?	—	—	—
	If yes, when was the plan submitted?			

RCRA LAND DISPOSAL RESTRICTION INSPECTION

Facility: AT & T Bell Labs

U.S. EPA I.D. No.: NJ D011328887

Street: Crawfords Corner Rd.

City: Holmdel State: NJ Zip Code: 07733

Telephone: (201) 564-2645

Operator: _____

Street: _____

City: _____ State: _____ Zip Code: _____

Telephone: _____

Owner: _____

Street: _____

City: _____ State: _____ Zip Code: _____

Telephone: _____

Inspection Date: 08/18/88 Time: 0900-1745 Weather Conditions: _____

Name	Affiliation	Telephone
Inspectors: <u>Peter Maruhn</u>	<u>DEP</u>	<u>(609) 426-0700</u>

Facility Representatives: Edward Nowak Env. Mng. Sp.
David Cesario Env. Fac. Mgr

	RCRA Status	F-Solvent	LDR Status California List
Generator	<u>✓</u>	<u>✓</u>	<u>✓</u>
Transporter	<u> </u>	<u> </u>	<u> </u>
Treater	<u> </u>	<u> </u>	<u> </u>
Storer	<u>✓</u>	<u> </u>	<u> </u>
Disposer	<u> </u>	<u> </u>	<u> </u>

INSPECTION SUMMARY

Q T & T Ball Ltr at Cranford
Cormie Rd Holmdel Nj generate
solvents used in lab procedures and
out-dated and off-spec reagents.

**RCRA LAND DISPOSAL RESTRICTION INSPECTION
APPLICABILITY CHECKLIST**

Does the facility handle the following wastes?

		Gen.	Treat	Store	Disp.	Trans.
A.	<u>F-Solvent Wastes</u>					
1.	F001	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2.	F002	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3.	F003	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4.	F004	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5.	F005	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Note: Use Appendix A to determine whether the facility is misclassifying any of its wastes.

B. California List Wastes

1. Liquid hazardous waste (including free liquids associated with any solid or sludge) that contains the following metals at concentrations greater than or equal to those specified

		Gen.	Treat	Store	Disp.	Trans.
Arsenic	500 mg/L	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Cadmium	100 mg/L	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Chromium VI	500 mg/L	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Lead	500 mg/L	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Mercury	20 mg/L	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Nickel	134 mg/L	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Selenium	100 mg/L	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Thallium	130 mg/L	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

2. Liquid hazardous waste (including free liquids associated with any solid or sludge) that contains free cyanides at concentrations greater than or equal to 1,000 mg/L

Gen.	Treat	Store	Disp.	Trans.
_____	_____	_____	_____	_____

3. Liquid hazardous waste that has a pH of less than or equal to 2.0

_____	_____	_____	_____	_____
-------	-------	-------	-------	-------

4. Liquid hazardous waste that contains PCBs at concentrations greater than or equal to

50 ppm _____

500 ppm _____

Does the facility mix liquid hazardous waste that contains PCBs with other types of wastes?

_____ Yes ☒ No _____ NA

If yes, state reasons for mixing:

5. Liquid hazardous waste that is primarily water and that contains HOCs greater than or equal to 1,000 mg/L (dilute HOC wastewater) and less than 10,000 mg/L

_____	_____	_____	_____	_____
-------	-------	-------	-------	-------

Note: The prohibitions of 268.32(a)(3) and (e) do not apply if the HOC waste is also subject to the solvent restrictions of 268 Subpart C or a specific HOC.

RCRA LAND DISPOSAL RESTRICTION INSPECTION

GENERATOR CHECKLIST

GENERATOR REQUIREMENTS

A. BDAT Treatability Group - Treatment Standards Identification

1. F-Solvent Wastes: Does the generator correctly determine the appropriate treatability group of the waste?

☒ Yes ☐ No ☐ NA

If yes, check the appropriate treatability group.

- ☐ Wastewaters containing solvents (less than or equal to 1% TOC by weight)
☐ Pharmaceutical wastewater containing spent methylene chloride
☒ All other spent solvent wastes

2. California List Wastes: Does the generator correctly determine the appropriate treatment standard of the waste?

- a. For liquid hazardous waste that contains PCBs at concentrations greater than or equal to 50 but less 500 ppm, is the treatment in accordance with existing TSCA thermal treatment regulations for burning in high efficiency boilers (40 CFR 761.60) or incineration (40 CFR 761.70)?

☐ Yes ☐ No ☒ NA

If yes, specify the method: _____

- b. For liquid hazardous waste that contains PCBs at concentrations greater than or equal to 500 ppm, is the waste incinerated or disposed of by other approved alternate methods (40 CFR 761.60 (e))?

☐ Yes ☐ No ☒ NA

If yes, specify the method and state whether the facility has submitted a written request to the Regional Administrator or Assistant Administrator for an exemption from the incineration requirement:

B. Waste Analysis**1. F-Solvent Wastes**

- a. Does the generator determine whether the F-solvent waste exceeds treatment standards?

☒ Yes ☐ No ☐ NA

How was this determination made?

- Knowledge of waste

☒ Yes ☐ No

If yes, note how this is adequate: _____

- TCLP

☐ Yes ☒ No

If yes, provide the date of last test, the frequency of testing, and note any problems. Attach test results.

- b. Does the F-solvent waste exceed applicable treatability group treatment standards upon generation [268.7(a)(2)]?

☐ Yes ☐ No ☒ NA

If yes, specify the waste stream: _____

- c. Does the generator dilute the F-solvent waste as a substitute for adequate treatment [268.3]?

☐ Yes ☐ No ☒ NA

- d. How does the generator test F-solvent waste when a process or waste stream changes?

2. California List Wastes

- a. Does the generator determine whether the waste is a liquid according to the Paint Filter Liquids Test (PFLT method 9095) as described by SW-846?

☐ Yes ☒ No ☐ NA

- b. If the waste is determined to be a liquid according to PFLT, is an absorbent added to the waste?

____ Yes ____ No ☒ NA

What type of absorbent is used? _____
Check the types of waste to which absorbent is added.

____ Liquid hazardous waste having a pH less than or equal to 2

____ Liquid hazardous waste containing HOCs in concentrations greater than or equal to 1,000 mg/L, but less than 10,000 mg/L

____ Liquid hazardous waste containing metals

____ Liquid hazardous waste containing free cyanides

- c. Does the generator determine whether the concentration levels (not extract or filtrate) in the waste equal or exceed the prohibition levels or whether the waste has a pH of less than or equal to 2.0 based on:

- Knowledge of wastes

____ Yes ____ No ☒ NA

If yes, note how this is adequate: _____

- Testing

____ Yes ____ No ☒ NA

If yes, list test method used: _____

- d. Does the generator determine if concentration levels in PFLT extract exceed cyanide and metals concentration levels?

____ Yes ____ No ☒ NA

- If yes, list test method used and constituent and concentration levels that exceeded prohibition levels: _____

- e. Does the generator dilute the waste as a substitute for adequate treatment [268.3]?

____ Yes ☒ No ____ NA

C. Management

1. On-Site Management

Is waste that exceeds the treatment standards treated, stored, or disposed on-site?

_____ Yes ☒ No

If yes, the TSD Checklist must be completed.

2. Off-Site Management

- a. Does the generator ship any waste that exceeds the treatment standards to an off-site treatment or storage facility?

☒ Yes _____ No

If yes, does the generator provide notification to the treatment or storage facility [268.7(a)(1)]?

☒ Yes _____ No

If yes, does notification contain the following?

EPA Hazardous waste number(s)	<input checked="" type="checkbox"/> Yes	_____ No
Applicable treatment standards	<input checked="" type="checkbox"/> Yes	_____ No
Manifest number	<input checked="" type="checkbox"/> Yes	_____ No
Waste analysis data, if available	<input checked="" type="checkbox"/> Yes	_____ No

Identify off-site treatment or storage facilities: Advanced
Environmental Tech ~~ENHANCE~~ MT Olive MI

- b. Does the generator ship any waste that meets the treatment standards to an off-site disposal facility?

_____ Yes ☒ No

If yes, does the generator provide notification and certification to the disposal facility [268.7(a)(2)]?

_____ Yes _____ No

If yes, does notification contain the following?

EPA Hazardous waste number(s)	_____ Yes	_____ No
Applicable treatment standards	_____ Yes	_____ No
Manifest number	_____ Yes	_____ No
Waste analysis data, if available	_____ Yes	_____ No
Certification that the waste meets treatment standards	_____ Yes	_____ No

Identify off-site land disposal facilities: _____

- c. If the waste is subject to a nationwide variance (e.g., solvent-water mixtures less than 1%), extension (268.5), or petition (268.6), does the generator provide notification to the off-site disposal facility that the waste is exempt from land disposal restrictions [268.7(a)(3)]?

_____ Yes _____ No ☒ NA

D. Treatment Using RCRA 264/265 Exempt Units or Processes
 (i.e., boilers, furnaces, distillation units, wastewater treatment tanks, elementary neutralization, etc.)

Are treatment residuals generated from units or processes exempt under RCRA 264/265?

_____ Yes _____ No N/A ☒

If yes, list types of waste treatment units and processes:

RCRA LAND DISPOSAL RESTRICTION INSPECTION

TRANSPORTER CHECKLIST

TRANSPORTER REQUIREMENTS

- A. Does the transporter accumulate waste for more than 10 days [268.50(A)(3)]?

_____ Yes _____ No

If yes, check the appropriate regulatory status:

_____ Interim status for storage

_____ RCRA permit for storage

If no, describe inventory controls to ensure that wastes are not stored for more than 10 days: _____

- B. Does the transporter mix, combine, or recontainerize wastes?

_____ Yes _____ No

- C. Is the waste treated in an exempt treatment process on-site?

_____ Yes _____ No

RCRA LAND DISPOSAL RESTRICTION INSPECTION

TSD CHECKLIST

TSD REQUIREMENTS

A. General Facility Standards

1. Does the waste analysis plan cover Part 268 requirements [264.13 or 265.13]?

o F-solvent ☐ Yes ☐ No ☐ NA

o California List ☐ Yes ☐ No ☐ NA

2. Does the facility obtain representative chemical and physical analyses of wastes and residues?

☐ Yes ☐ No

a. What date was the waste analysis plan last revised? _____

b. Are analyses conducted on-site or off-site?

☐ On-site ☐ Off-site

Identify off-site lab: _____

c. Is F-solvent waste analyzed using TCLP?

☐ Yes ☐ No ☐ NA

d. Describe the frequency of sampling: _____

e. Describe procedures used to identify manifest discrepancies:

3. Are the operating records, including analyses and quantities, complete [264.73/265.73]?

☐ Yes ☐ No

B. Storage (268.50)

1. Are restricted wastes stored on-site?

_____ Yes _____ No

If no, go to C, Treatment in Surface Impoundments.

2. If yes, check the appropriate method.

_____ Tanks
_____ Containers

3. Are all containers clearly marked to identify the contents and date(s) entering storage?

_____ Yes _____ No _____ NA

4. Do operating records track the location, quantity of the wastes, and dates that the wastes enter and leave storage?

_____ Yes _____ No

5. Do operating records agree with container labeling?

_____ Yes _____ No _____ NA

6. Have wastes been stored for more than 1 year since the applicable LDR regulations went into effect?

_____ Yes _____ No _____ NA

If yes, can the facility show that such accumulation is necessary to facilitate proper recovery, treatment, or disposal?

_____ Yes _____ No

If yes, state how: _____

7. Have tanks been emptied at least once per year since the applicable LDR regulations went into effect?

_____ Yes _____ No _____ NA

If yes, do the operating records show that the volume of waste removed from tanks annually equals or is more than the tank volume?

_____ Yes _____ No

8. Are all tanks clearly marked with a description of the contents, the quantity of wastes received, and date(s) entering storage, or is such information recorded and maintained in the operating record?

_____ Yes _____ No _____ NA

C. Treatment

1. Does the facility treat restricted wastes other than in surface impoundments?

_____ Yes _____ No

If no, go to D, Treatment in Surface Impoundments.

2. Describe the treatment processes:

3. Does the facility, in accordance with an acceptable waste analysis plan, determine whether the residue from all treatment processes is less than treatment standards [268.7(b)]?

_____ Yes _____ No

4. Describe frequency of testing treatment residuals:

5. Is dilution used as a substitute for treatment?

_____ Yes _____ No

6. Are notifications prepared by the generators kept in the facility's operating record? ☐ Yes ☐ No
7. Does the facility ship any waste or treatment residue that meets the treatment standards to an off-site disposal facility? ☐ Yes ☐ No ☐ NA

If yes, does the treatment facility provide notification and certification to the disposal facility?

☐ Yes ☐ No

If yes, does notification contain the following?

EPA Hazardous waste number(s)	<input type="checkbox"/> Yes	<input type="checkbox"/> No
Applicable treatment standards	<input type="checkbox"/> Yes	<input type="checkbox"/> No
Manifest number	<input type="checkbox"/> Yes	<input type="checkbox"/> No
Waste analysis data, if available	<input type="checkbox"/> Yes	<input type="checkbox"/> No
Certification that the waste meets the treatment standards	<input type="checkbox"/> Yes	<input type="checkbox"/> No

Identify off-site disposal facilities: _____

D. Treatment in Surface Impoundments

1. Are restricted wastes placed in surface impoundments for treatment? ☐ Yes ☐ No

If no, go to E, Land Disposal.

2. If yes, did the facility submit to the Agency the waste analysis plan and certification of compliance with minimum technology and ground-water monitoring requirements? ☐ Yes ☐ No

3. If the minimum technology requirements have not been met, has a waiver been granted for that unit?

_____ Yes _____ No

4. Are representative samples of the sludge and supernatant from the surface impoundment tested separately, acceptably, and in accordance with the sampling frequency and analysis specified in the waste analysis plan?

_____ Yes _____ No

Attach test results.

5. Do the hazardous waste residues (sludges or liquids) exceed the treatment standards specified in 268.41?

_____ Yes _____ No

6. Provide the frequency of analyses conducted on treatment residues: _____

7. Does the operating record adequately document the results of waste analyses performed in accordance with 268.41?

_____ Yes _____ No

8. Are the hazardous waste residues that exceed the treatment standards (268.41) removed adequately and on an annual basis?

Sludge _____ Yes _____ No

Supernatant _____ Yes _____ No

- a. If no, and supernatant is determined to exceed treatment concentrations, is annual volume of liquid flowing through the impoundment greater than the impoundment volume?

_____ Yes _____ No

- b. Are adequate precautions taken to protect liners, and do records indicate that liner integrity is inspected?

_____ Yes _____ No

- c. Are residues subsequently managed in another surface impoundment?

_____ Yes _____ No

- d. Are residues treated prior to disposal?

_____ Yes _____ No

If yes, are waste residues treated on-site or off-site?

_____ On-site _____ Off-site

Identify treatment method: _____

E. Land Disposal

1. Are restricted wastes placed in land disposal units such as landfills, surface impoundments waste piles, wells, land treatment units, salt domes/beds, mines/caves, or concrete vault or bunker?

_____ Yes _____ No

Note: Do not include surface impoundments addressed in D, Treatment in Surface Impoundments.

If yes, specify which units and what wastes each unit has received: _____

2. Does the facility operating record have notices and certifications from generators/storer/treaters [268.7(c); 268.7(a),(b)]?

_____ Yes _____ No

3. Does the facility obtain waste analysis data or test the wastes (according to the waste analysis plan) to determine that the wastes comply with the applicable treatment standards [268.7(c)]?

_____ Yes _____ No

If yes, at what frequency? _____

4. If restricted wastes that exceed the treatment standards are placed in land disposal units (excluding national capacity variances) [268.30(a)], does facility have an approved waiver based on no migration petition [268.6], an approved case-by-case capacity extension [268.5], or variance [268.44]?

_____ Yes _____ No

5. Does the facility dispose of restricted wastes that are subject to a national capacity variance?

_____ Yes _____ No

If yes, are these wastes disposed of in a new, replacement, or laterally expanded landfill or impoundment that meets the minimum technology requirements (double liner and leachate collection)?

_____ Yes _____ No

6. Does the facility have notices [268.7(a)(3)] and records of disposal for disposed wastes that are subject to a national capacity variance, case-by-case extensions [268.5], or no migration petitions [268.6]?

_____ Yes _____ No _____ NA

7. What is the volume of the restricted wastes disposed of to date?

8. If the facility has a case-by-case extension, is the facility making progress as described in progress reports?

_____ Yes _____ No _____ NA

APPENDIX A

SOLVENT IDENTIFICATION CHECKLIST

1. Does the handler generate any of the following F001 constituents (i.e., spent halogenated solvents used in degreasing) as a result of being used in the process either in pure form or commercial grade?

tetrachloroethylene	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
trichloroethylene	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
methylene chloride	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
1,1,1-trichloroethane	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
carbon tetrachloride	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
chlorinated fluorocarbons	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No

2. Does the handler generate any of the following F002 constituents (i.e., spent halogenated solvents) as a result of being used in the process either in pure form or commercial grade?

tetrachloroethylene	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
trichloroethylene	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
methylene chloride	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
1,1,1-trichloroethane	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
chlorobenzene	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
trichlorofluoromethane	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
1,1,2-trichloro-1,2,2-trifluoroethane	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
ortho-dichlorobenzene	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No

3. Does the handler generate any of the following F003 constituents (i.e., spent nonhalogenated solvents) as a result of being used in the process either in pure form or commercial grade?

xylene	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
acetone	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
ethyl acetate	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
ethyl benzene	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
ethyl ether	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
methyl isobutyl ketone	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
n-butyl alcohol	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
cyclohexanone	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No
methanol	<input type="checkbox"/> Yes	<input checked="" type="checkbox"/> No

If the F003 waste stream has been mixed with a solid waste, does the resultant mixture exhibit the ignitability characteristic?

☐ Yes ☐ No

4. Does the handler generate any of the following F004 constituents (i.e., spent nonhalogenated solvents) as a result of being used in the process either in pure form or commercial grade?

cresols and cresylic acid
nitrobenzene

___ Yes ☒ No
___ Yes ☒ No

5. Does the handler generate any of the following F005 constituents (i.e., spent nonhalogenated solvents) as a result of being used in the process either in pure form or commercial grade?

toluene
methyl ethyl ketone
carbon disulfide
isobutanol
pyridine

___ Yes ☒ No
___ Yes ☒ No
___ Yes ☒ No
___ Yes ☒ No
___ Yes ☒ No

6. Are any of the constituents listed in questions 1 through 5 used for their "solvent" properties -- that is to solubilize (dissolve) or mobilize other constituents? The following questions will be helpful in confirming this determination.

(a) Are the constituents used as chemical carriers? ☒ No
___ Yes

If yes, list the constituents.

(b) Are the constituents used for degreasing/cleaning? ☒ No
___ Yes

If yes, list the constituents.

(c) Are the constituents used as diluents? ☒ No
___ Yes

If yes, list the constituents.

(d) Are the constituents used as extractants? ☒ No
___ Yes

If yes, list the constituents.

(e) Are the constituents used for fabric scouring? ☐ Yes ☒ No

If yes, list the constituents.

(f) Are the constituents used as reaction and synthesis media? ☐ Yes ☒ No

If yes, list the constituents.

If the responses to questions 1 through 6 led the inspector to believe that the waste may be an F-solvent, answer question 7.

7. Are any of the above constituents spent solvents? (A solvent is considered "spent" when it has been used and is no longer usable without being regenerated, reclaimed, or otherwise reprocessed.) ☐ Yes ☐ No
8. If the waste is a mixture of constituents as determined in questions 1 through 6, give the concentration before use of all the constituents in the solvent mixture/blend. For example:

5%	methylene chloride
2%	trichloroethylene
25%	1,1,1-trichloroethane
<u>68%</u>	mineral spirits
100%	

If the waste stream is a mixture containing a total of 10% or more (by volume) of one or more of the F001, F002, F004, or F005 listed constituents before use, it is a listed waste.

With respect to the F003 solvent wastes, if, before use, the waste stream is mixed and contains only F003 constituents, it is a listed waste. For example:

33%	acetone
16%	methanol
<u>51%</u>	ethyl ether
100%	

If the waste stream is a mixture containing F003 constituents and a total of 10% or more of one or more of the F001, F002, F004, and F005 listed constituents before use, it is a listed waste. For example:

50%	xylene (F003)
12%	TCE (F001)
<u>38%</u>	mineral spirits
100%	

If in light of the above, the handler appears to be generating F001 - F005 hazardous wastes, refer this facility to the enforcement official for followup actions verifying the use of solvents at the facility.

**APPENDIX B
TREATMENT STANDARDS FOR F-SOLVENTS**

F001-F005 SPENT SOLVENTS	CONCENTRATION (IN MG/L)	
	WASTEWATERS	OTHER WASTES
Acetone	0.05	0.59
N-butyl	5.0	5.0
Carbon disulfide	1.05	4.81
Carbon tetrachloride	.05	.96
Chlorobenzene	.15	.05
Cresols (and cresylic acid)	2.82	.75
Cyclohexanone	.125	.75
1,2-dichlorobenzene	.65	.125
Ethyl acetate	.05	.75
Ethyl benzene	.05	.053
Ethyl ether	.05	.75
Isobutanol	5.0	5.0
Methanol	.25	.75
Methylene chloride	.20	.96
Methylene chloride (from the pharmaceutical industry)	12.7	.96
Methyl ethyl ketone	0.05	0.75
Methyl isobutyl ketone	0.05	.33
Nitrobenzene	0.66	0.125
Pyridine	1.12	0.33
Tetrachloroethylene	0.079	0.05
Toluene	1.12	0.33
1,1,1-Trichloroethane	1.05	0.41
1,2,2-Trichlor 1,2,2-trifluoroethane	1.05	0.96
Trichloroethylene	0.062	0.091
Trichlorofluoromethane	0.05	0.96
Xylene	0.05	0.15

Wastes shipped to:

TSD NAME LOCATION EPA ID NO.	TYPE OF FACILITY T/D METHODS	WASTE CODE	WASTE QUANTITY	COMMENTS (shipment dates, waste descriptions, etc.)
Advanced Env Tech Mt Olive NJ NJ D080631369	TSD	F002	80 P	Lab packs
		F003	80 P	"
		D001	160 P	Flammable liq corrosive 4-11-88
		F001	800 P	
		F003	500 P	
		D002	172 P	8-11-88
		F003	870 P	
		D001	80 P	Flamm & corrosive
		D002	80 P	6-13-88
		F003	2400 P	
		D001	400 P	Flamm 2-5-88

REFERENCE NO. 19

CERTIFIED MAIL
RETURN RECEIPT REQUESTED



AT&T Bell Laboratories

101 John F. Kennedy Parkway
Short Hills, New Jersey 07078-0905
201 564-2000

August 29, 1988

Mr. Peter Maruhnic
State of New Jersey
Department of Environmental Protection
Division of Hazardous Waste Management
Central Bureau of Field Operations
Twin Rivers Professional Building
East Windsor, New Jersey 08520

Re: AT&T Bell Laboratories, Holmdel Facility RCRA Inspection

Dear Mr. Maruhnic:

This letter is in response to the issue of transportation of small quantities of waste generated at AT&T Bell Laboratories satellite facility discussed during the August 18, 1988 RCRA inspection. Attached please find a copy of the correspondence from the New Jersey Department of Environmental Protection (NJDEP) dated August 3, 1983. This letter outlines the Department's understanding and concurrence of how AT&T-BL handles the transportation.

The fourth paragraph of the letter states ... "it was not necessary to manifest these shipments; nor was it necessary to use a permitted hazardous waste hauler. However, you are required to use a permitted solid waste hauler and it was suggested that you might register one of the Bell's trucks to serve this purpose".

During your inspection, David Cesareo supplied for your information our Solid Waste Administration (SWA) registration number and detailed how we are operating currently in terms of transporting our waste from our satellite facilities. This current operation is exactly as detailed in the referenced letter.

If you require further information on this matter after reviewing the letter, please call David Cesareo at (201) 564-2626 or Martha Coopersmith-Gray at (201) 564-2655.

Very truly yours,


Paul E. Wyszowski, P.E.
Manager
Environmental Management Department

Attachment
as above

Copy (w/attach.) to

G. R. Bogdan

N. C. Burnett

D. J. Cesareo

M. C. Coopersmith-Gray

W. J. England

D. J. Martindell

E. Nowak

G. M. Wilkening

J. Zec

REFERENCE NO. 20



State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT

Michele M. Putnam
Deputy Director

John J. Trela, Ph.D., Director
401 East State St.
CN 028
Trenton, N.J. 08625-0028
(609)633-1408

Lance R. Miller
Deputy Director

Hazardous Waste Operations

Responsible Party Remedial Action

Hazardous Waste Facility Permit

Under the provisions of N.J.S.A. 13:1E-1 et seq. known as the Solid Waste Management Act, this permit is hereby issued to:

Bell Telephone Laboratories, Incorporated
for
AT&T Bell Laboratories
Crawfords Corner Road
Holmdel, New Jersey 07733

For the Purpose of Operating a: Hazardous Waste Storage Facility
On Lot No.: 38
Block No. 11
In the Municipality of: Township of Holmdel
County: Monmouth
Under Facility Permit No.: 1318G1HP01

This permit is subject to compliance with all conditions specified herein and all regulations promulgated by the Department of Environmental Protection.


This permit shall not prejudice any claim the State may have to Riparian land nor does it permit the registrant to fill or alter, or allow to be filled or altered, in any way, lands that are deemed to be Riparian, Wetlands, stream encroachment or flood plains, or within the Coastal Area Facility Review Act (CAFRA) zone or allow the discharge of pollutants to waters of this State without first acquiring the necessary grants, permits, or approvals from the Department of Environmental Protection or the U.S. Environmental Protection Agency.

12/23/88

Date

12/23/93

Expiration Date


Frank Coolick

Acting Assistant Director

Scope of Permit

AT&T Bell Laboratories is a communications-related research and development facility. Rinse waters and other aqueous hazardous wastes generated from research and development laboratories are stored in one (1) vaulted tank of 6,000 gallon capacity, spent etching solutions, waste paint thinner, and spent solvents are stored in 17 X 55-gallon drums or the equivalent volume of 30-gallon drums with a total capacity of 935 gallons at the diked pad area. Small containers (bottles, jars, jugs, etc.) of laboratory wastes are stored in two (2) masonry rooms and one (1) cabinet with a total capacity of 95 gallons. Laboratory wastes generated on-site or off-site from company-owned locations are stored in these areas. No hazardous waste is disposed of at AT&T Bell Laboratories.

Section I

General Conditions Applicable to Non-Commercial Hazardous Waste
Facility Permits

The permit is conditioned upon compliance with and implementation of the following:

1) Duty to Comply

The permittee shall comply with all conditions of this Permit. Any permit non-compliance constitutes a violation of the Solid Waste Management Act (N.J.S.A. 13:1E-1.1 et seq.) and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application.

Any generator, hauler, facility operator or any other person who discharges or is responsible for discharge of hazardous waste on land or in the waters of the State of New Jersey or at any place other than an approved hazardous waste facility shall be subject to penalties pursuant to N.J.S.A. 58:10A-1 et seq.

2) Duty to Reapply

If the permittee wishes to continue an activity regulated by this permit after the expiration date of this permit, the permittee must submit a complete application for a new permit at least 180 days prior to permit expiration.

3) Duty to Halt or Reduce Activity

It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.

4) Duty to Mitigate

The permittee shall take all reasonable steps to minimize or correct any adverse impact on the environment resulting from non-compliance with this permit.

5) Proper Operation and Maintenance

The permittee shall at all times properly operate and maintain the facility and systems of treatment and control, and related appurtenances, which are installed or used by the permittee to achieve compliance with the conditions of this permit. Proper operation and maintenance includes effective performance, adequate funding, adequate operator staffing and training, and adequate laboratory and process controls, including appropriate quality

assurance procedures. This provision requires the operation of backup or auxiliary facilities or similar systems only when necessary to achieve compliance with the conditions of this permit.

6) Permit Actions

This permit may be modified or revoked and reissued for cause pursuant to N.J.A.C. 7:26-12.6. Also, the Department reserves the right to terminate an existing permit for cause pursuant to N.J.A.C. 7:26-12.7.

The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination or a notification of planned changes or anticipated non-compliance, does not stay any permit condition.

7) Property Rights

This permit does not convey any property rights of any sort, or any exclusive privilege.

8) Duty to Provide Information

The permittee shall furnish to the Department, within a reasonable time, any information which the Department may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. The permittee shall also furnish to the Department, upon request, copies of records required to be kept by this permit.

9) Right of Entry

The permittee shall allow an authorized representative of the Department upon presentation of credentials to:

- a) Enter upon the permittee's premises where a regulated facility or activity is located or conducted, or where records shall be kept under the conditions of this permit;
- b) Have access to and copy any records that should be kept under the conditions of this permit;
- c) Inspect any facilities, equipment (including monitoring control equipment), practices, or operations regulated or required under this permit; and
- d) Sample or monitor for the purposes of assuring permit compliance or as otherwise authorized by the Solid Waste Management Act (N.J.S.A. 13:1E-1.1 et seq.), any substances at any location.

10) Monitoring and Records

Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity.

- a) The permittee shall retain records of all monitoring information, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least 3 years from the date of the sample, measurement, report, or application. This period may be extended by request of the Department at any time.
- b) Records of monitoring information shall include:
 - 1) the date, exact place, and time of sampling or measurement;
 - 2) the individual(s) who performed the sampling or measurements;
 - 3) the date(s) analyses were performed;
 - 4) the individual(s) who performed the analyses;
 - 5) the analytical techniques or methods used; and
 - 6) the results of each analysis.

11) Signatory Requirement

All applications, reports, or information submitted to the Department shall be signed and certified pursuant to N.J.A.C. 7:26-12.2(1).

12) Reporting Requirements

- a) Upon issuance of this permit, the permittee shall comply with the procedure outlined in condition 12(a)1 below. Failure to comply with the aforementioned procedure shall be cause for immediate revocation of this permit:
 - 1) The permittee shall submit to the Department, by certified mail or hand delivery, within thirty (30) days of the effective date of this permit, a letter signed by the permittee and a registered professional engineer, who is licensed by the State of New Jersey, stating that the facility layout and design is in compliance with the Engineering Plans and Reports cited in Condition 1(a) of Section II of this permit. This shall include the submittal of a revised set of the engineering drawings cited in Condition 1(a) of Section II of this permit, if necessary. If applicable, these drawings shall be signed and sealed by a New Jersey licensed professional engineer; and

- 2) The Department shall inspect the facility to determine whether or not it is in compliance with the designs set forth in the Engineering Plans and Reports, and whether the operations of the facility are in compliance with the conditions of this permit. If within 15 days of the date of submission of the letter in Condition 12(a)(1) of this section, the permittee has not received from the Department notice of intent to inspect, prior inspection is waived and it is understood that the facility meets the design requirements. If the facility is not in compliance with the approved design and other conditions of this permit, a schedule shall be submitted within thirty (30) days of the date of the Department's inspection, outlining how the facility will be brought into compliance. The schedule shall be subject to the Department's approval.

b) Planned Changes

The permittee shall give notice to the Department as soon as possible of any planned physical alterations or additions to the permitted facility. The permittee shall obtain Departmental approval, prior to implementation, for any such alteration or addition subject to Departmental regulations or the conditions of this permit, including permit modification or permit revocation and reissuance, if necessary.

c) Anticipated Noncompliance

The permittee shall give advance notice to the Department of any planned changes in the permitted facility or activity which may result in noncompliance with permit requirements. Such advance notice shall not stay the applicability of said permit requirements or the applicability of Condition 1 of this permit, nor shall it relieve the permittee from the obligation to obtain all necessary Departmental approvals of said changes prior to implementation, including permit modification, permit revocation and reissuance, or issuance of an emergency permit, when necessary.

d) Transfer of Ownership or Operational Control

- 1) Permits issued pursuant to N.J.A.C. 7:26-12.1 et seq. are not transferable directly to a new owner or operator.
- 2) The permittee shall notify the Department at least 90 days in advance of any proposed change of ownership or operational control of a facility. The notice shall include:
 - 1) An Alternative Information Statement prepared by the prospective new permittee meeting the requirements of N.J.A.C. 7:26-12.2(h);

- ii) A written agreement between the existing permittee and the proposed new permittee containing a specific future date for transfer of permit responsibilities coverage and liabilities between them;
 - iii) A demonstration that the financial responsibility requirements of N.J.A.C. 7:26-9.10 and N.J.A.C. 7:26-9.13 will be met by the proposed new permittee.
- 3) A new owner or operator may commence operations at the facility only after the existing permit has been revoked and reissued pursuant to N.J.A.C. 7:26-12.6(c).
 - 4) The permittee of record remains liable for ensuring compliance with all conditions of the permit unless and until the existing permit is reissued in the name of the new owner or operator.

e) Annual Reports

The permittee must prepare and submit two copies of a facility annual report to the Department as per N.J.A.C. 7:26-7.6(f)2 by March 1 of each year, covering the previous calendar year's hazardous waste facility activities.

f) Discharge and Other Emergency Reporting

The permittee shall report any noncompliance which may endanger human health or the environment. The following information shall be reported orally to the Department immediately after the permittee becomes aware of the circumstances by calling (609) 292-7172 (24 Hours).

- 1) Information concerning release of any hazardous waste that may cause an endangerment to public drinking water supplies.
- 2) Any information of a release or discharge of hazardous waste, or a fire or explosion from a hazardous waste facility which could threaten the environment or human health outside the facility.
- 3) The description of the occurrence and its cause shall include:
 - i) Name, address, and telephone number of the owner or operator;
 - ii) Name, address, and telephone number of the facility;
 - iii) Date, time and type of incident;

- iv) Name and quantity of material(s) involved;
- v) The extent of injuries, if any;
- vi) An assessment of actual or potential hazards to the environment and human health outside the facility, where this is applicable; and
- vii) Estimated quantity and disposition of recovered material that resulted from the incident.

A written submission shall also be provided within five days of the time the permittee becomes aware of the circumstances to the address in Section (i) of this condition. The written submission shall contain a description of the noncompliance and its cause; the period of noncompliance, including exact dates and time, and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance.

g) Other Noncompliance

The permittee shall report all instances of noncompliance not reported under Section (c) or (f) of this Condition within 30 days of the time the permittee becomes aware of the noncompliance. The reports shall contain the information listed in Section (f) of this Condition.

h) Other Information

Where the permittee becomes aware that it failed to submit any relevant facts in a permit application or submitted incorrect information in a permit application or in any report to the Department, it shall promptly submit such facts or information.

i) Department Address

All reports and submittals required by this permit are to be submitted to the Department of Environmental Protection at the following address:

Department of Environmental Protection
Division of Hazardous Waste Management
Chief, Bureau of Hazardous Waste Engineering
CN028
Trenton, New Jersey 08625

Copies of all submittals shall also be sent to the Regional Office of the Bureau of Field Operations.

13) Preparedness and Prevention Plan

The permittee must equip the facility with emergency equipment in order to minimize the possibility of a fire, explosion, or any unplanned sudden or non-sudden release of hazardous wastes or hazardous waste constituents to the air, surface water, or ground water which could threaten the environment or human health. The facility's equipment must include, but not be limited to, the following:

- a) Portable fire extinguishers placed in locations throughout the facility.
- b) An adequate water supply shall be maintained on-site or be available to fight fires and provide cooling during emergencies.
- c) Telephone communications must be locally maintained to summon emergency assistance from local fire departments, police departments, state or local emergency response teams.
- d) Spill containment structures must be maintained free of cracks or gaps.
- e) Absorbent compounds must be readily available within the facility to be employed if a spill should occur.
- f) All preparedness and prevention equipment shall be tested and maintained as necessary to assure its proper operation in time of emergency.

14) Personnel Training

- a) Facility personnel shall successfully complete a program of classroom instruction or on-the-job-training that teaches them to perform their duties in a way that insures the facility's compliance with the requirements of N.J.A.C. 7:26-9.4 (g), as stated in the facility's part B permit application, and as referenced in Condition 1(a) of Section II of this permit. New employees shall be trained within six (6) months of the date of employment.
- b) The training program shall be maintained with records and documentation describing the type and amount of both introductory and continuing training that has been and will be given to each person engaged in hazardous waste management at the facility.

15) Financial Requirements

- a) The permittee shall continue to maintain financial responsibility for claims arising from the operations of the facility from sudden and accidental occurrences that cause injury to persons or property. The permittee shall have and maintain liability insurance for sudden occurrences in the amount of at least \$1 million per occurrence with an annual

aggregate of at least \$2 million, exclusive of legal defense costs.

The following is a summary of acceptable means to demonstrate financial responsibility for sudden and accidental occurrences under N.J.A.C. 7:26-9.13:

- 1) Submission of an originally signed duplicate of the insurance policy. This policy must be either:
 - i) Amended by attachment of an originally signed duplicate of a Hazardous Waste Facility Liability Endorsement; or
 - ii) An originally signed duplicate of a Certificate of Liability Insurance must accompany the policy as evidence of the coverage.
- 2) Passing a financial test for liability coverage according to N.J.A.C. 7:26-9.13(f).
- 3) Use of a combination of insurance and financial test.
- b) The permittee shall continue the use of the financial assurance mechanisms in N.J.A.C. 7:26-9.10 to provide financial assurance for closure of the facility.

The following is a summary of the closure mechanisms that are allowed for facilities under N.J.A.C. 7:26-9.10:

- 1) Closure Trust Fund, N.J.A.C. 7:26-9.10(f)1;
- 2) Surety bond guaranteeing payment into a closure trust fund, N.J.A.C. 7:26-9.10(f)2;
- 3) Performance bond, N.J.A.C. 7:26-9.10(f)3.
- 4) Closure Letter of Credit and establishment of a standby trust fund at the time of the letter of credit is obtained, N.J.A.C. 7:26-9.10(f)4;
- 5) Closure Insurance, N.J.A.C. 7:26-9.10(f)5.
- c) The wording of all financial documents (except for the insurance policy itself) that are submitted under 15(a) or 15(b) above must be exactly as specified in N.J.A.C. 7:26-9 (Appendix A).
- d) The permittee must adjust the facility's closure cost estimate for inflation within thirty (30) days after each anniversary of the date on which the first closure cost estimate was prepared. Whenever the current closure cost estimate increases to an amount greater than the amount of the financial mechanism, the permittee, within sixty (60)

days after the increase, must either cause the amount of the financial mechanism to be increased so that it at least equals the current closure cost estimate and submit evidence of such increase to the Department, or obtain and document to the Department other financial assurance, as specified in N.J.A.C. 7:26-9.10, to cover the increase.

16) Operating Record

The permittee shall keep a written operating record at the facility in which the information in N.J.A.C. 7:26-9.4(i) shall be recorded. The information should be recorded as it becomes available and maintained until closure of the facility.

17) Posting of Notice

The notice concerning civil and criminal penalties for illegal disposal of hazardous waste must be conspicuously posted and available for all employees to read.

18) Early Expiration of Permit

If, for any reason, this facility ceases to be operated on a continuous basis and/or ceases to be operated by the owners or operators listed in the Alternative Informative Statement that was submitted, the permit expires of its own accord and remains ineffective until reissuance by the Department.

19) Permit Limitations

- a) The issuance of a permit does not authorize any injury to persons or property or invasion of other private rights or any infringement of applicable Federal, State, or local laws or regulations.
- b) This permit does not constitute the sole source of guidelines to be followed. Any new or current regulations concerning Water Quality, Air Pollution, Hazardous Waste, or other rules of the Department of Environmental Protection, applicable to the facility shall be complied with at the effective date. Regulations are effective upon publication in the New Jersey Register or as otherwise indicated in the Notice of Adoption in the New Jersey Register.

20) Contingency Plan

- a) The provisions of the Contingency Plan included in the Part B permit application plus all amendments, revisions and modifications thereof subsequently submitted for review and accepted by the Department, and as referenced in Condition 1(b)5 of Section II of this permit, shall be carried out immediately whenever there is a fire, explosion or release of hazardous waste constituents which could threaten health or the environment.

- b) In the event of an emergency an alarm system must be activated to alert employees. The local Fire and Police Department should be notified immediately. The telephone numbers are:

Fire Department: (201) 946-4400

Police Department: (201) 946-4400

- c) If the facility has a discharge, fire, or explosion which could threaten human health or the environment, the following shall be notified immediately:

1) Environmental Protection Agency
Oil and Hazardous Materials Section
Raritan Depot, Edison, N.J. 08817
Telephone (201) 548-8730

2) New Jersey Department of Environmental Protection
Communication Center/ Trenton Dispatch
Bureau of Communication and Support Services
Trenton, NJ 08625
Telephone (609) 292-7172 (24 Hours)

- d) The emergency coordinator's notification to both of the above two telephone numbers must include the following information:

- 1) Name and telephone number of person reporting;
- 2) Name and address of facility;
- 3) Time and type of incident (fire or explosion);
- 4) Name and quantity of material(s) involved, to the extent known;
- 5) The extent of injuries, if any; and
- 6) The possible hazards to human health, or the environment, outside the facility.

- e) Semi-annual drills involving all employees and appropriate local authorities shall be conducted to test emergency response capabilities at the facility in accordance with the contingency plan and emergency procedures developed pursuant to N.J.A.C. 7:26-9.7.

21) Security

The permittee must maintain the security procedures as described in the facility's security plan, included in the Part B permit application plus all amendments, revisions and modifications thereof subsequently submitted for review and accepted by the

Department, and as referenced in Condition 1(a) of Section II of this permit.

These procedures will include:

- 1) Controlled entry at the main gate and all other access gates to the site.
- 2) An artificial or natural barrier, which completely surrounds the active portion of the facility. Maintenance of any fence which encloses the entire manufacturing site.
- 3) Maintenance of warning signs posted with the legend, "Danger-Hazardous Waste Area - Unauthorized Personnel Keep Out", at each entrance of the hazardous waste management area, and also in sufficient numbers around this area, which can be seen from a distance of 25 feet.

Section II

Specific Conditions Applicable to Hazardous Waste Facility Permits

The permit is conditioned upon compliance with and implementation of the following:

1) Referenced Permit Application Documents

a) The permittee shall operate the facility, and construct or install associated appurtenances thereto, in accordance with the hazardous waste management provisions of Title 7, Chapter 26 of the New Jersey Administrative Code, the conditions of this permit, and the following permit application documents:

- 1) AT&T Bell Laboratories Part A and Part B permit applications dated June 4, 1986, signed by Norman A. Pancoast, Vice President of Finance, Personnel and General Services.
- 2) Engineering design plans prepared by Peter W. Tunnicliffe, P.E., and Chaitanyasa M. Bijoor, P.E., dated April 16, 1986.
- 3) Report covering additional information on the Part A and Part B permit applications signed by Paul E. Wyszowski, P.E., dated December 3, 1986 and August 7, 1987.

In case of conflict, the hazardous waste management provisions of Title 7, Chapter 26 of the New Jersey Administrative Code shall have precedence over the conditions of this permit, and the conditions of this permit shall have precedence over the permit application documents listed above.

b) One complete set of the permit application documents listed in Condition 1(a) above, this Hazardous Waste Facility Permit, and all records, reports and plans as may be required pursuant to this permit shall be kept on-site and shall be available for inspection by authorized representatives of the Department upon presentation of credentials. The records, reports and plans required pursuant to this permit include the following:

- 1) The Preparedness and Prevention Plan required by Condition 13 of Section I of this permit and N.J.A.C. 7:26-9.6.
- 2) The Personnel Training Plan and records required by Condition 14 of Section I of this permit and N.J.A.C. 7:26-9.4(g).

- 3) Copies of the financial documents and closure cost estimate required by Condition 15 of Section I of this permit and N.J.A.C. 7:26-9.10 and N.J.A.C. 7:26-9.13.
- 4) The written Operating Record required by Condition 16 of Section I of this permit and N.J.A.C. 7:26-9.4(i).
- 5) The Contingency Plan required by Condition 20 of Section I of this permit and N.J.A.C. 7:26-9.7, and specifically the plan prepared by Paul E. Wyszowski, P.E., dated June 4, 1986 and revised August 7, 1987.
- 6) The Waste Analysis Plan outlined in Condition 4 of Section II of this permit and as required by N.J.A.C. 7:26-9.4(b), and specifically the plan prepared by Paul E. Wyszowski, P.E., dated June 4, 1986 and revised August 7, 1987.
- 7) The Inspection Requirements required by Condition 5 of Section II of this permit and N.J.A.C. 7:26-9.4(f) and N.J.A.C. 7:26-10, and prepared by Paul E. Wyszowski, P.E., dated June 4, 1986.
- 8) The Closure Plan required by Condition 6 of Section II of this permit and N.J.A.C. 7:26-9.8 and N.J.A.C. 7:26-10, and prepared by Paul E. Wyszowski, P.E., and dated June 4, 1986 and revised August 7, 1987.
- 9) The Soil Sampling and Analysis Plan required by Condition 7 of Section II of this permit, and prepared by Paul E. Wyszowski, P.E., dated December 3, 1986 and revised August 7, 1987.

2) Authorized Activities

a) Container (Drum) Storage

The permittee is authorized to store on-site generated wastes, as well as wastes generated at company-owned off-site locations, in containers (drums) on the diked concrete pad as delineated in the referenced permit application documents of Condition 1(a) of Section II. This area shall have a concrete base with a minimum 6 inches thickness.

<u>Description</u>	<u>Permitted Capacity</u>
Storage pad for spent etching solution, paint thinner waste, and spent solvent (14'2"L X 39'6"W X 6"H)	935 gallons of liquids (17 x 55 gal.drums or equivalent volume of 30-gal. drums)

The containers shall be stored within the diked area on wooden pallets.

The permittee shall, on a daily basis, remove any spills from the catch basin within the containerized hazardous waste storage area and shall recontainerize the material for disposal as hazardous waste at off-site authorized facilities. The control valve on the drainage system shall be kept in the closed position. The valve may be opened to discharge accumulated precipitation to Ramanessian Brook provided there are no visible hazardous waste spills and the accumulated liquid has been analyzed and found to be in compliance with the facility's NJPDES permit.

The permittee shall not place either incompatible wastes in the same drum or hazardous waste in an unwashed drum that previously held in incompatible waste or material.

b) Small Containers Storage

The permittee is authorized to store on-site generated hazardous waste in small containers (bottles, jars, jugs, etc.) as well as hazardous waste in small containers received from other AT&T Bell Laboratories facilities (Crawford Hill facility, Middletown facility and Red Hill Road facility) in the small containers storage areas. These areas are located within the laboratory wastewater treatment Building #61 as delineated in the referenced permit application documents of Condition 1(a) of Section II. Each area shall have a concrete base with a minimum 6 inches thickness.

<u>Description</u>	<u>Permitted Capacity</u>
Masonry room No. 1 No. 1 for acids and oxidizers	40 gallons of liquids, semi-liquids, semi-solids or solids in plastic or glass bottles, jugs, jars, etc.
Masonry room No. 2 No. 2 for caustics and cyanides	40 gallons of liquids, semi-liquids, semi-solids or solids in plastic or glass bottles, jugs, jars, etc.
Cabinet near masonry rooms #1 and #2 for compatible flammable and reactives	15 gallons of liquids, semi-liquids, semi-solids or solids in plastic or glass bottles, jars, jugs, etc.

Each small container storage area shall have reservoir at the bottom to contain any spills or leakage. Bottles, jars, jugs, etc. shall be stored on shelves to prevent them from

contacting any spilled liquid. The inside area of each reservoir shall be maintained free of gaps or cracks. The permittee shall, on a daily basis, remove any spills from each reservoir and recontainerize the material for disposal as hazardous waste at an authorized off-site facility.

c) Tank Storage

- 1) The permittee is authorized to store hazardous waste generated on-site from the research and development laboratories consisting of rinse waters and aqueous wastes, as well as wastes generated at company-owned off-site locations, in the lined carbon steel tank which sits in a roofed concrete vault at the location delineated in the referenced permit application documents of Condition 1(a) of Section II. The vaulted tank area (11'0"L X 21'0"W X 12'5"H) shall have a concrete base of a minimum 6 inches thickness.

<u>Tank Number</u>	<u>Minimum Shell thickness (inch)</u>	<u>Design Capacity of Tank in gallons</u>
1	0.167	6,000

The permittee shall use the waste pouring station and associated piping leading to the tank for transfer of wastes from containers into the tank. The transfer shall be performed manually and the tank contents shall be pumped out for treatment or disposal at an authorized off-site facility when the capacity reaches approximately 5,000 gallons. The pouring station shall be equipped with a lid which shall be kept in the closed position when waste transfer operations are not taking place. Any spills surrounding the pouring station and any separated solids on the screen within the pouring station shall be removed immediately and containerized for disposal at an authorized off-site facility.

The base of the containment vault shall be maintained free of gaps and cracks. The permittee shall remove any accumulated liquids from the sump area back into the tank or containerize the material for disposal as hazardous waste at an authorized off-site facility.

2) Tank Shell Thickness Measurements

- 1) The permittee shall comply with the tank shell thickness measurements plan and report as specified in the Part B application cited in Condition 1(a) of Section II. At a minimum, within six (6) months of the effective date of this hazardous waste facility permit, the permittee shall follow the following procedures to obtain the tank shell thickness measurements on the tank:

- A) The waste storage tank shall be emptied prior to initiating the testing.
- B) The tank surface shall be prepared by use of a fine emery paper to provide a clean surface at the time of the testing.
- C) Ultrasonic testing shall be used to determine tank wall thickness.
- D) The tank shall be tested of a total of four (4) points: two (2) points on opposite sides of the cylindrical portion and on each head.

All results of the tests for tank shell thickness shall be submitted to the Department within thirty (30) days after each testing date.

ii) Beginning three (3) years from the initial testing date, and on every three (3) years thereafter the permittee shall repeat the tank shell thickness test on the tank.

iii) In the event the results of a test for tank shell thickness indicate a shell thickness less than the minimum shell thickness of 0.167 inch specified in Condition 2(c)(1) of Section II, the permittee shall comply with the following:

- A) Provide immediately oral and written notification to the Department of the tank failing the minimum shell thickness;
- B) Refrain from adding any waste to the tank;
- C) Submit a corrective plan to the Department, within thirty (30) days from the date of oral notification, for Department review and written approval; and
- D) The company shall not use or close the tank without obtaining written approval from the Department.

3) Authorized Wastes

- a) The permittee is authorized to store the following types of on-site generated wastes, as well as wastes generated at company-owned off-site locations, in 55-gallon or 30-gallon containers at the facility.

<u>NJDEP Hazardous Waste Numbers</u>	<u>Description of Hazardous Waste</u>
D001	Ignitable
D002	Corrosive
F001	The following spent halogenated solvents used in degreasing: tetrachloroethylene, trichloroethylene, methylene chloride, 1,1,1-trichloroethane, carbon tetrachloride, and chlorinated fluorocarbons; all spent solvent mixtures/blends used in degreasing containing, before use, a total percent of 10 percent or more (by volume) of one or more of the above halogenated solvents or those solvents listed in F002, F004 and F005; and still bottoms from the recovery of these spent solvents and spent solvent mixtures.
F002	The following spent halogenated solvents: tetrachloroethylene, methylene chloride, trichloroethylene, 1,1,1-trichloroethane, chlorobenzene, 1,1,2-trichloro-1,2,2-trifluoroethane, 0-dichlorobenzene, trichlorofluoromethane, and 1,1,2-trichloroethane; all spent solvent mixtures/blends containing, before use, a total of 10 percent or more (by volume) of one or more of the above halogenated solvents or those listed in F001, F004 or F005; and the still bottoms from the recovery of these spent solvents and spent solvent mixtures.
F003	The following spent non-halogenated solvents: xylene, acetone, ethyl acetate, ethyl benzene, ethyl ether, methyl isobutyl ketone, n-butyl alcohol, cyclohexanone, and methanol; all spent solvent mixtures/blends containing, before use, a total of 10 percent or more (by volume) of one or more of the non-halogenated solvents listed in F001, F002, F004 and F005; and the still bottoms from the

recovery of these spent solvents and spent solvent mixtures.

F004

The following spent non-halogenated solvents: cresols and cresylic acid, and nitrobenzene; all spent solvent mixtures/blends containing, before use, a total of 10 percent or more (by volume) of the above non-halogenated solvents or those solvents listed in F001, F002, and F005; and all still bottoms from the recovery of these spent solvents and spent solvent mixtures.

F005

The following spent non-halogenated solvents: toluene, methyl ethyl ketone, carbon disulfide, isobutanol, pyridine, benzene, 2-ethoxyethanol, and 2-nitropropane; all spent solvent mixtures/blends containing, before use, a total of 10 percent or more (by volume) of one or more of the non-halogenated solvents listed above or those solvents listed in F001, F002 or F004; and still bottoms from the recovery of these spent solvents and spent solvent mixtures.

- b) The permittee is authorized to store in small containers (bottles, jars, jugs, etc.) the following on-site generated waste types as well as the waste types generated from company- owned off-site locations at the indoor small containerized hazardous waste storage areas at the facility:

NJDEP Hazardous
Waste Numbers

Description of Hazardous Waste

D001	Ignitable
D002	Corrosive
D003	Reactive (Potassium borohydride, Rubidium, Barium, Sodium in solvent, Calcium turnings, and Magnesium powder).
D004	EP Toxic Arsenic
D005	EP Toxic Barium
D006	EP Toxic Cadmium
D007	EP Toxic Chromium
D008	EP Toxic Lead
D009	EP Toxic Mercury

D010 EP Toxic Selenium
D011 EP Toxic Silver

F001 The following spent halogenated solvents used in degreasing: tetrachloroethylene, trichloroethylene, methylene chloride, 1,1,1-trichloroethane, carbon tetrachloride, and chlorinated fluorocarbons; all spent solvent mixtures/blends used in degreasing containing, before use, a total percent of 10 percent or more (by volume) of one or more of the above halogenated solvents or those solvents listed in F002, F004 and F005; and still bottoms from the recovery of these spent solvents and spent solvent mixtures.

F002 The following spent halogenated solvents: tetrachloroethylene, methylene chloride, trichloroethylene, 1,1,1-trichloroethane, chlorobenzene, 1,1,2-trichloro-1,2,2-trifluoroethane, O-dichlorobenzene, trichlorofluoromethane, and 1,1,2-trichloroethane; all spent solvent mixtures/blends containing, before use, a total of 10 percent or more (by volume) of one or more of the above halogenated solvents or those listed in F001, F004 or F005; and the still bottoms from the recovery of these spent solvents and spent solvent mixtures.

F003 The following spent non-halogenated solvents: xylene, acetone, ethyl acetate, ethyl benzene, ethyl ether, methyl isobutyl ketone, n-butyl alcohol, cyclohexanone, and methanol; all spent solvent mixtures/blends containing, before use, a total of 10 percent or more (by volume) of one or more of the non-halogenated solvents listed in F001, F002, F004 and F005; and the still bottoms from the recovery of these spent solvents and spent solvent mixtures.

F004 The following spent non-halogenated solvents: cresols and cresylic acid,

and nitrobenzene; all spent solvent mixtures/blends containing, before use, a total of 10 percent or more (by volume) of the above non-halogenated solvents or those solvents listed in F001, F002, and F005; and all still bottoms from the recovery of these spent solvents and spent solvent mixtures.

F005 The following spent non-halogenated solvents: toluene, methyl ethyl ketone, carbon disulfide, isobutanol, pyridine, benzene, 2-ethoxyethanol, and 2-nitropropane; all spent solvent mixtures/blends containing, before use, a total of 10 percent or more (by volume) of one or more of the non-halogenated solvents listed above or those solvents listed in F001, F002 or F004; and still bottoms from the recovery of these spent solvents and spent solvent mixtures.

F007 Spent cyanide plating bath solutions from electroplating operations.

X721 Waste automotive crankcase and lubricating oils.

X725 Oil spill cleanup residue which: A. is contaminated beyond saturation; or, B. the generator fails to demonstrate that the spilled material was not one of the listed hazardous waste oils.

X726 The following used and unused waste oils: metal working oils, turbine lubricating oils, diesel lubricating oils; and quenching oils.

X727 Waste oil from the draining, cleaning or disposal of electric transformers with PCB's less than 50 ppm.

"P" Code Numbers Any discarded commercial chemical products, off-specification species, and spill residues thereof which are listed in N.J.A.C. 7:26-8.15(e).

"U" Code Numbers Any discarded commercial chemical products, off-specification species, and spill residues thereof which are

listed in N.J.A.C. 7:26-8.15(f).

"C" Code Numbers Any waste streams containing the hazardous constituents under hazardous waste "C" Code Numbers listed in N.J.A.C. 7:26-8.16(a).

The permittee must obtain necessary approvals from the USEPA before storage of polychlorinated biphenyl, N.O.S. under the C387 waste code if the concentration of PCB's is equal to, or in excess of, 50 ppm.

The permittee is also authorized to store in small containers non-hazardous waste being managed as hazardous waste under the following code:

<u>NJDEP Hazardous Waste Numbers</u>	<u>Description of Hazardous Waste</u>
X850	Packed laboratory chemicals
X900	Non-hazardous liquid waste
X910	Non-hazardous solid waste
X940	Poisons and pesticides, N.O.S.

- c) The permittee is authorized to store in the tank laboratory rinse waters and aqueous wastes generated on-site from the research and development laboratories, as well as waste generated at company-owned off-site locations, which are hazardous for the following characteristics:

<u>NJDEP Hazardous Waste Numbers</u>	<u>Description of Hazardous Waste</u>
D002	Corrosive
D004	EP Toxic Arsenic
D005	EP Toxic Barium
D006	EP Toxic Cadmium
D007	EP Toxic Chromium
D008	EP Toxic Lead
D009	EP Toxic Mercury
D010	EP Toxic Selenium
D011	EP Toxic Silver

The permittee is also authorized to store in the tank non-hazardous laboratory rinse waters and other non-hazardous aqueous wastes not meeting the criteria of hazardous waste under N.J.A.C. 7:26-8.1 et seq., provided said waste managed as hazardous waste under the following code:

<u>NJDEP Hazardous Waste Numbers</u>	<u>Description of Hazardous Waste</u>
X900	Non-hazardous liquid waste.

4) Waste Analysis and Quality Assurance Requirements

The permittee shall comply with the following for each waste generated at this facility or accepted from company-owned off-site facilities:

- a) For each waste stream, the permittee shall complete an Unwanted Chemical Removal Tag or Spent Etching Disposal Tag. For each small container of hazardous waste to be stored in two (2) masonry rooms and one (1) cabinet, the permittee shall also complete a Waste Data Sheet (WDS). Each WDS, Unwanted Chemical Removal Tag and Spent Etching Disposal Tag shall contain, at a minimum, the same information as the sample forms provided in the Part B application cited in Condition 1(a) of Section II of this permit.
- b) For each waste, a qualified facility personnel with guidance from the Environmental Management Department of AT&T Bell Laboratories shall review the information on the applicable WDS, Unwanted Chemical Removal Tag or Spent Etching Disposal Tag to determine appropriate classification and storage areas. If the waste meets appropriate classification and storage requirements as authorized by Conditions 2 and 3 of Section II, then the permittee may accept the container of waste for storage at the facility.
- c) The waste need not be analyzed unless the permittee has reason to believe it is not as represented on the WDS, Unwanted Chemical Removal Tag or Spent Etching Disposal Tag.
- d) The permittee shall review and update as necessary each tag on a yearly basis. Also, whenever a process generating a particular waste is changed, the WDS, Unwanted Removal Tag and Spent Etching Disposal tag for that waste shall be modified as necessary.
- e) Prior to the addition of any waste to the tank, the wastes shall be tested for compatibility with the hazardous wastes already stored in the tank. Compatibility shall be determined by mixing 5 milliliters of the waste with 50 milliliters of the tank's contents to confirm the absence of gas evolution, fumes or changes in temperature. Incompatible wastes shall not be added to the tank.
- f) The permittee shall maintain a log book for the hazardous waste storage tank with a record of all additions: date, waste type, quantity and the name of the person performing the addition.
- g) Prior to shipment of waste from the tank to an authorized off-site disposal facility, the permittee shall collect a representative sample and have it analyzed for pH, arsenic, lead and mercury.

- h) Prior to the addition of any waste to a drum, the waste shall be tested for compatibility with the wastes already stored in the drum. The compatibility test shall be by the same method as described in Condition 4(e) of Section II above. Incompatible hazardous wastes shall not be added to a drum.
- i) The permittee shall maintain a separate log book for the wastes stored in drums with a record of all additions: drum identification, date, waste type, quantity and the name of the person performing the addition.
- j) The permittee does not need to analyze the content of a filled drum provided the log book provides sufficient information to characterize the waste.
- k) All analyses on the waste performed by the permittee shall be performed in accordance with the Quality Assurance/Quality Control methods established by the Division of Hazardous Waste Management. A copy of all waste testing results shall be retained for a minimum of three (3) years.
- l) The Department is presently reviewing the waste analysis plan, included in AT&T Bell Laboratories Part B application, in accordance with the standards provided by the USEPA, Region II. In order to accomplish equivalent standards required by the USEPA, the Department has assigned this task to the Quality Assurance Section of the Bureau of Environmental Measurements and Quality Assurance. If this review reveals deficiencies, the permittee shall be required to submit a revised waste analysis plan to the Department for approval.

5) Inspection Requirements

The permittee shall comply with the inspections, as outlined in Section 6 of the referenced permit application documents in Condition 1(a) of Section II, for equipment malfunction, structural deterioration, operator errors, spills or leakage and discharges that could cause or lead to the release of hazardous waste constituents and adversely affect the environment or threaten human health. AT&T Bell Laboratories shall conduct the inspections per the schedules listed below:

a) Container (Drum) Storage Area

<u>Activity/Equipment</u>	<u>Inspected for</u>	<u>Frequency</u>
Container placement	minimum 18" aisle, neat, stable	Daily
Container sealing	all bungs & covers	Daily
Container labeling	labels complete	Daily

Container condition	leaks, deterioration	Daily
Pad area	cracks	Weekly
Dike walls	cracks	Weekly
Drain valve	operation and position	Weekly
Shower and eyewash	operational condition	Weekly
Container location by type	segregation per Condition 3 of Section II	Daily

b) Small Container Storage Area

<u>Activity/Equipment</u>	<u>Inspected for</u>	<u>Frequency</u>
Container Labeling	labels complete	Weekly
Container condition	leaks	Weekly
Container sealing	covers	Weekly
Reservoir	standing leaks, cracks	Weekly
Container location	segregation per Condition 3 of Section II	Weekly

c) Tank Storage Area

<u>Activity/Equipment</u>	<u>Inspected for</u>	<u>Frequency</u>
Tank Condition	leaks, stains	Daily
Waste in the tank	level	Daily
Tank shell thickness	shell thickness	Every 3 years
Dike wall	cracks	Weekly
Vault base	standing water, cracks	Weekly
Pipes	supported, no leaks	Weekly
Loading pad drain	operational	Weekly
Ladder and platforms	structural defects	Weekly

d) Security

<u>Activity/Equipment</u>	<u>Inspected for</u>	<u>Frequency</u>
Fence	Functional	Weekly
Lock on gate of fence	Position, close or open	Daily

A written log of all inspections, including copies of the completed inspection checklists as provided in the referenced permit application documents of Condition 1(a) of Section II, is to be kept on-site. At a minimum, this log must include the date and time of each inspection, the name of the inspectors, a notation of observations made, and the date and nature of any repairs or other remedial actions performed.

6) Closure Plan

At the time of final closure of the facility, the permittee must close the facility in the manner that is stated in the referenced permit application documents of Condition 1(a) of Section II, which shall entail:

a) Hazardous Waste Storage Tank

- 1) All hazardous waste and hazardous residues shall be removed and manifested to an authorized off-site facility.
- 2) Subsequent to removal of wastes, the permittee shall either remove as hazardous waste at off-site authorized facilities or decontaminate following the decontamination procedures for the storage area and structures as described in the referenced permit application documents of Condition 1(a) of Section II by Paul E. Wyszowski, P.E., dated August 7, 1987. The procedure includes:
 - i) The tank, feed pipe, and pouring station shall be rinsed with clean water or a commercial cleaner.
 - ii) A sample of the rinse shall be taken and analyzed for indicator parameters to confirm the removal of all hazardous waste from the tank and feed system. The analyses shall include determinations for total metals by atomic absorption, and priority pollutant volatile organics by gas chromatograph/mass spectrometry (GC/MS).
 - iii) The above procedures 2(i) and 2(ii) shall be repeated until the analytical test results indicate that the tank, feed pipe and pouring station are properly decontaminated.

b) Drum Storage Area

- 1) All drummed hazardous waste and hazardous waste residues shall be removed and manifested to an authorized off-site facility.
- 2) Subsequent to removal of wastes, the permittee shall either remove as hazardous waste at off-site authorized facility or decontaminate following the decontamination procedures for the storage areas and structures as described in the referenced permit application documents of Condition 1(a) of Section II by Paul E. Wyszowski, P.E., dated August 7, 1987. The procedure includes:
 - i) Chip samples of the concrete base shall be obtained and tested to determine if hazardous waste contamination exists. Chip samples shall be analyzed for total metals by atomic absorption techniques, petroleum hydrocarbons by extraction and infrared detection, and priority pollutant volatile organics by GC/MS techniques.
 - ii) If contamination is detected, the drum storage area shall be washed with a commercial cleaner.
 - iii) The above procedures 2(i) and 2(ii) shall be repeated until the chip test results indicate that the facility's drum storage areas and structures are decontaminated.

c) Small Container Storage Area

- 1) All bottles, jars, jugs, etc. of hazardous waste and hazardous waste residues shall be removed from two (2) masonry rooms and one (1) cabinet and manifested to an authorized off-site facility.
- 2) Subsequent to the removal of hazardous wastes, the permittee shall either remove as hazardous waste at off-site authorized facilities or decontaminate following the decontamination procedures for the storage areas and structures as described in the referenced permit application documents of Condition 1(a) of Section II by Paul E. Wyszowski, P.E., dated August 7, 1987. The procedure includes:
 - i) Wipe samples shall be obtained and tested to determine if hazardous waste contamination exists. Wipe samples shall be analyzed for priority pollutants by GC/MS and petroleum hydrocarbons by extraction and infrared detection.

- ii) If contamination is detected, the small container storage area shall be washed with a commercial cleaner.
- iii) The above procedures 2(i) and 2(ii) shall be repeated until the wipe test results indicate that the facility's small container storage in two (2) masonry rooms and one (1) cabinet areas and structures are decontaminated.
- d) All waste water and residues generated from decontamination operations of cleaning the vaulted tank, containerized hazardous waste storage areas and structures shall be immediately containerized, and promptly manifested to authorized off-site facilities.
- e) The permittee shall amend the closure plan any time changes in operating plans or facility design affect the closure plan or whenever there is a change in the expected year of closure of the facility. The plan must be amended within sixty (60) days of the changes.
- f) The permittee shall notify the Department at least 180 days prior to the date the permittee expects to begin closure, except in cases where the facility's permit is terminated or if the facility is otherwise ordered by judicial decree or compliance order to cease receiving the wastes or to close. The date when the owner or operator "expects to begin closure" shall be within thirty (30) days after the date on which the owner or operator expects to receive the final volume of wastes.

7) Soil Sampling and Analysis Requirements

- a) The permittee shall comply with the soil sampling and analysis plan and report as specified in the Part B application cited in Condition 1(a) of Section II. At a minimum, within sixty (60) days of the effective date of this hazardous waste facility permit, the permittee shall collect the following samples to a depth approximately six (6) inches from the ground surface at the facility.

Sample Number

Description

S1

A grab sediment sample obtained from the catch basin in the drum storage area.

S2

A grab soil sample obtained from the ground surface near the waste pouring station east south of the drum storage area.

S3 A grab soil sample obtained from the ground surface adjacent to the waste tank pump-out pit north west of the vaulted tank.

S4 A grab soil sample obtained from the drainage ditch located near the drum storage pad. In addition, samples shall be taken from unpaved areas where stained soils exist.

- b) The volatile organic fraction sample shall be collected to a depth approximately 6 to 12 inches in accordance with NJDEP sampling procedures.
- c) The permittee shall use a laboratory approved by the NJDEP to perform sample analyses. The Laboratory conducting the soil analysis utilize CLP SOW for Organics and inorganics Analysis or SW-846 3rd edition methodologies. SW-846 methods to be utilized include: Method 8240 for volatiles; Method 8270 for semivolatile; methods for other parameters should be specified. All samples from the 0 to 6 inch interval shall be collected using a stainless steel trowel. All samples from 6 to 12 inches shall be collected using a stainless steel hand bucket auger. The sampling equipment shall be cleaned prior to use and between the samples. The permittee shall use the following sequence for decontamination of sampling equipment.
1. Non-phosphate detergent and tap water rinse.
 2. Tap water rinse.
 3. Distilled/deionized water rinse
 4. 10% nitric acid rinse.
 5. Distilled/deionized water rinse.
 6. Acetone (pesticide grade) rinse.
 7. Total air dry.
 8. Distilled/deionized water rinse.
- d) The permittee shall analyze all samples collected to a depth of 0 to 6 inch from the ground surface for the Target Compound List (TCL) metals, and petroleum hydrocarbons. All samples collected to a depth of 6 to 12 inches shall be analyzed for TCL volatile organics plus 10 peaks. All samples must be accompanied by full chain of custody record to ensure legal integrity of the samples and the data generated. All field methods and analytical tests shall be in accordance with applicable NJDEP or USEPA procedures of SW846, 3rd edition. Data results must be reported according to the latest version of USEPA CLP-Tier I format deliverables requirements if SOW Organics and Inorganics Analysis is utilized. If 3rd edition SW-846 methodologies are used, then at a minimum, results must meet the

deliverables format requirements as specified in the 3rd edition SW-846.

- e) The initial comprehensive analyses shall serve to establish background levels of the TCL metals and petroleum hydrocarbons, and the TCL volatile organics plus 10 peaks in the soil at the site as well as the existing soil contamination conditions.
- f) Beginning one (1) year from the initial soil sampling date, and on an annual basis thereafter the permittee shall repeat the soil sampling and analyses program for soil samples S1, S2, S3 and S4 specified in paragraphs a through d of this Condition 7 of Section II above.
- g) Two (2) copies of a written report of the finding of the analyses of these soil samples shall be submitted to the Department within sixty (60) days of the date samples were taken. If, after review of the results, the Department determines that contamination exists in the soil, the permittee shall submit a cleanup plan within sixty (60) days of notification of the Department's determination. The cleanup plan shall include the following information:
 - 1) A detailed description of the most practicable method cleanup of the facility;
 - 2) A time schedule for implementation of the cleanup plan;
 - 3) A description of the procedures that will be used to prevent future soil contamination, if applicable;
 - 4) A compliance schedule for implementation of a ground water monitoring system in accordance with N.J.A.C. 7:14A-6 to determine if contamination has entered the ground water.

Upon approval and acceptance of the cleanup plan by the Department, the permittee shall implement the cleanup program within 30 days after being notified.

- h) The facility owner shall notify the Department at least two (2) weeks in advance of each soil sampling date so that a representative of the Department may be present to audit the soil sampling procedure.

DOCUMENT: AT&T10

FOLDER: HWEMCB

REFERENCE NO. 21

CONTROL NO.:

02-8909-14

DATE:

10/11/89

TIME:

1625

DISTRIBUTION:

AT&T BELL LABS - HOLMDEL

BETWEEN:

WATER CLERK

OF:

MATAWAN WATER DEPT

PHONE:

(201) 290-2002

AND:

JIM FROST, NUS

(NUS)

DISCUSSION:

After asking, the clerk said the Matawan Water Department services about 2500 customers.

ACTION ITEMS:

REFERENCE NO. 22

DUTY OFFICER NOTIFICATION REPORT

CASE NO. 89-03-27-1027

DATE 3-27-89

REC'D BY (24)

TIME 1044

INCIDENT REPORT BY:

Name Ed Nowak Phone 201-564-2645

Street _____

City _____

State _____

Affiliation/Title AT-T Bell Labs

INCIDENT LOCATION: AT-T

Transportation _____

Facility _____

Other: _____

Name (Site): Holmdel Facility - AT-T Phone _____

Street Crawford Corner Rd.

City Holmdel Twp.

County Monmouth State _____

Zip Code _____

Date of Incident: 3-21-89

Time: 1422

IDENTITY OF SUBSTANCE(S) SPILLED, RELEASED, ETC.:

____ Suspected

____ Unknown

Name of Substance(s) (Gas, Liquid, Solid): Kerosene - Gasoline

Amount Released/Spilled UNK

____ Actual

____ Potential

____ Estimated

Substance Contained Y N U

Type of Release/Spill: _____

____ Terminated

____ Continuous

____ Intermittent

Hazardous Material Y N U

INCIDENT DESCRIPTION:

____ Fire ____ Explosion ____ Air Rel X Spill ____ MVA ____ Derailment ____ Smoke/Dust

____ Odors ____ Sewage ____ NJPOES ____ Noise ____ Wildlife ____ Illegal Dumping ____ Drums

____ Equip Start-Up/Shutdown, Equip Fail/Upset, etc. _____

____ Other (specify) _____

Injuries Y (X) U

Public Exposure Y N U

Facility Evacuation Y (X) U

Fire Department at Scene Y N U

Population Evacuation Y (X) U

Police at Scene Y N U

Potable Water Source Y (X) U

Assistance Requested Y N U

Continuation of ____ Air X Land ? Water

Precipitation Y N U

Receiving Water pos. g.w.

Wind Direction/Speed _____

Location Type: ____ Residential ____ Industrial ____ Commercial ____ Rural ____ Sensitive Population (Hosp., School, Nurs. Home)

STATUS AT INCIDENT SCENE Soil test results showed contam. in area of two 550 gal tanks, which were removed NEPCO to clean-up.

RESPONSIBLE PARTY:

____ Suspected

____ Unknown

Company Name _____ Phone _____

Contact John J. Stone Title _____

Street _____

City _____ County _____ State _____ Zip Code _____

OFFICIALS NOTIFIED (Name/Title):

NJSP: _____ / _____ Phone _____ Date/Time _____ / _____ (T/A)

Local Health: _____ / _____ Phone _____ Date/Time _____ / _____ (T/A)

Local Munic: _____ / _____ Phone _____ Date/Time _____ / _____ (T/A)

USEPA: _____ / _____ Phone _____ Date/Time _____ / _____ (T/A)

INCIDENT REFERRED TO:

____ DEQ X DWR ____ DSWM ____ DHSM X DHWM ____ DOH ____ DFG ____ DPF ____ DCJ ____ DCR

Region: ____ Northern ____ Metro X Central ____ Southern ____ ERI ____ ERI X BUST

1. Name/Title T. Bell / B. 457 Phone _____ Date/Time 3-27-89 / _____ (T/A)

2. Name/Title E. E. Ed / 03/28/89 Phone _____ Date/Time _____ / _____ (T/A)

3. Name/Title _____ / _____ Phone _____ Date/Time _____ / _____ (T/A)

DEP RESPONSE Emergency Immediate Priority No Response

COMMENTS:

REFERENCE NO. 23

INVESTIGATION

CASE: #89-03-07-1027

DATE: 03-30-89

DHWM FILE: 13-18-06

INVESTIGATOR: Todd King

LOCATION: AT&T - Bell Labs

TELEPHONE: (201) 564-2656

ADDRESS: Crawford Corner Road
Holmdel, Monmouth

EPA ID NUMBER: NJD011328887

LOCAL HEALTH DEPT. REP.: Larry Kosica

ORIGIN OF COMPLAINT: Ed Nowak - AT&T


NATURE OF COMPLAINT: Possible LUST

FINDINGS:

Arrived on-site and met with George Bogden, Senior Plant Engineer. He stated that on 3-8-89 a 550 gallon underground kerosene tank was removed and in the process another 550 gallon abandoned gasoline tank was encountered and also removed. Work was performed by IT Corporation. Contamination was noted in the excavation and samples were taken. Results came back with contamination as high as 7000 ppm. Plastic was placed in pit and then backfilled to await further remediation. Mr. Bogden stated that he was awaiting DEP recommendations. I stated that the State uses 100 ppm to clean up and that he should contact IT Corp. for further cleanup. He stated he would.

Issued NOV for N.J.S.A. 58:10-23.11c - Discharge of hazardous substances.

Left site.


Investigator Signature

df

REFERENCE NO. 24

NEW JERSEY DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT

~~501 E. State St. Trenton, NJ 08602~~
Two Rivers Industrial Bldg East number 215 135200
NOTICE OF VIOLATION

ID NO. 1000911325557 DATE 3/30/89
NAME OF FACILITY AT&T Bell Labs - Holmdel Facility
LOCATION OF FACILITY Robert R. Road Holmdel NJ 07733
NAME OF OPERATOR George Bogdan - Senior Plant Engineer

You are hereby NOTIFIED that during my inspection of your facility on the above date, the following violation(s) of the Solid Waste Management Act, (N.J.S.A. 13:1E-1 et seq.) and Regulations (N.J.A.C. 7:26-1 et seq.) promulgated thereunder and/or the Spill Compensation and Control Act, (N.J.S.A. 58:10-23.11 et seq.) and Regulations (N.J.A.C. 7:1E-1 et seq.) promulgated thereunder were observed. These violation(s) have been recorded as part of the permanent enforcement history of your facility.

DESCRIPTION OF VIOLATION

** NJSA 58:10-23.11 discharge of a hazardous substance*

(petroleum hydrocarbon contamination in excavated tank pit)*

Remedial action to correct these violations must be initiated immediately and be completed by

4/2/89. Within fifteen (15) days of receipt of this Notice of Violation, you shall submit in writing, to the investigator issuing this notice at the above address, the corrective measures you have taken to attain compliance. The issuance of this document serves as notice to you that a violation has occurred and does not preclude the State of New Jersey, or any of its agencies from initiating further administrative or legal action, or from assessing penalties, with respect to this or other violations. Violations of these regulations are punishable by penalties of \$25,000 per violation.

Glenn R. Bragdon
3/30/89

Paul E. Wozniak - Env. Mgmt

Todd King
Investigator, Division of Waste Management
Department of Environmental Protection

TODD KING
609-426-0700

REFERENCE NO. 25

CERTIFIED MAIL
RETURN RECEIPT REQUESTED



AT&T Bell Laboratories

101 John F. Kennedy Parkway
Short Hills, New Jersey 07078-0905
201 564-2000

April 7, 1989

Mr. Todd King
Central Bureau of Field Operations
Twin Rivers Professional Building
East Windsor, New Jersey 08520

Re: AT&T Bell Laboratories - Holmdel Facility
Notice of Violation

Dear Mr. King:

This is in reference to the Notice of Violation issued by you to the AT&T Bell Laboratories (AT&T-BTL) - Holmdel facility on March 30, 1989 for alleged discharge of a hazardous substance. This release was associated with the removal of a 550 gallon kerosene underground storage tank and a 550 gallon gasoline underground storage tank. The following summarizes discussions you had with Mr. George Bogdan, of the Holmdel facility, and Mr. Edward Nowak of my office which explain the background and our plans to remediate the problem.

On March 27, 1989 at 9:30 a.m., the AT&T-BTL notified the NJDEP Bureau of Underground Storage Tanks (BUST) (David Rubin) to report soil contamination associated with the removal of a 550 gallon kerosene tank and a 550 gallon gasoline tank at the AT&T-BTL Holmdel facility. The removal program was initiated on February 8, 1989 originally to address the kerosene tank (E1). During its removal an abandoned gasoline tank of the same size was found and included in the removal. Once the tanks were removed from the ground, kerosene contaminated soil was noticed. It was unclear if the contamination occurred during the tank removal project or existed prior to the removal operation. Overhead piping which are in service required the kerosene tank to be pushed forward and then lifted. This may have aggravated the integrity of the tank possibly causing the spill. The contaminated soil was removed and soil sampling was conducted for total petroleum hydrocarbons at the kerosene tank site and volatiles (BTX) at the gasoline tank site. The entire excavated area was lined with plastic and backfilled for safety reasons. The analysis which AT&T-BTL recently received showed total petroleum hydrocarbons over 100 ppm at the 4 sampling locations and one sampling location with BTX over 1 ppm at the gasoline tank site.

NJDEP BUST was informed that the site will be reexcavated to remediate the site. This includes additional soil sampling and analysis.

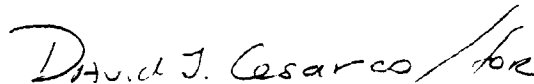
Mr. Rubin instructed AT&T-BTL to complete the tank removal notification forms which he will mail. In addition, he stated that the NJDEP tank removal forms should have been forwarded 30 days prior to tank removal projects. He was informed that the Underground Storage Tank Hotline was contacted approximately two months prior to the removal project to determine what notification, if any, was required for tank removal. The Hotline, at that time, did not mention any removal requirements. Mr. Rubin stated that the policy is recent.

Following our discussions with the BUST, the DEP Hotline was called to report the contamination (case # 89-03271027).

A meeting was held with IT Corporation on April 6, 1989 to discuss a scope of work for cleanup activities for this site. It is our understanding based on your telephone discussion with Edward Nowak, that the Central Bureau of Field Operations will coordinate this project for NJDEP. Therefore, once a scope of work is prepared a copy will be forwarded to you for your comments.

If you have any questions, please contact me at (201) 564-2632 or Edward Nowak at (201) 564-2645.

Very truly yours,

A handwritten signature in dark ink, appearing to read "David J. Cesario" followed by a stylized flourish.

Paul E. Wyszowski, P.E.
Manager

Environmental Management Department

REFERENCE NO. 26

NEW JERSEY DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT
HAZARDOUS WASTE INSPECTION REPORT

DWM-029

HAZARDOUS WASTE PERMIT FACILITY INSPECTION REPORT

FACILITY INFORMATION

FACILITY NAME: AT & T Bell Labs.
FILE NUMBER: _____
VHT FACILITY FILE NUMBER: _____
PERMIT #: 1318G/17P01
REGION: C
INSPECTION DATE: March 31, 1989
INCIDENT/CASE NUMBER: _____
INSPECTION TYPE: RCRA TSD Permit
RESPONSIBLE AGENCY CODE: _____
INSPECTOR'S NAME: Peter Maruhn
INSPECTOR'S AGENCY: DEP
INSPECTOR'S BUREAU: Field Operations
EPA ID NUMBER: NJD011328887
ADDRESS: Crawfords Corner Rd
Holmdel NJ 07733
LOT: 38 BLOCK: 11
COUNTY: Moumouth
FACILITY PERSONNEL: Edward Nowak Env. Mng. Sp.
William Havel Done Martindell Plant. Oper. Super
TELEPHONE #: (201) 564-2645
OTHER STATE/EPA PERSONNEL: _____
REPORT PREPARED BY: Peter Maruhn
REVIEWED BY: Louis E. J...
DATE OF REVIEW: 4-11-89

PHOTOS TAKEN: () YES (✓) NO

SAMPLE TAKEN: () YES (✓) NO

If yes, how many?

NO. OF SAMPLES: _____ NJDEP ID #: _____

MANIFESTS REVIEWED: (✓) YES () NO

Number of Manifests in Compliance: 177

Number of Manifests Not in Compliance: None

List Manifest Document Numbers of Those Manifests Not in Compliance:

HAZARDOUS WASTE FACILITIES WHICH
HAVE BEEN ISSUED A FINAL PERMIT

INSPECTION REPORT

NOTE: The inspector shall develop and implement an inspection form which addresses specific permit requirements. This specific form will be used in conjunction with the materials contained herein.

SUMMARY OF FINDINGSFACILITY DESCRIPTION AND OPERATIONS

AT & T Bell Labs at the Crawford Corner Rd in Holmdel has been operating since 1962. They employ about seven thousand people who work in a three story building of over one million square feet floor space. All work is communications related research and development which includes work on micro-chips, crystals, printed circuits and computer software.

Their final permit was issued with effective date of Dec 23, 1988 and with expiration date of Dec 23, 1993.

A site specific inspection checklist was developed and used to carry out the present RCRA inspection.

AT & T Bell Labs receives and stores on site hazardous waste generated at company owned off-site facilities. They transport these wastes using their own vehicle having a Solid Waste Permit No NJ SW 1211AA.

The hazardous wastes are disposed of on site.

SUMMARY OF FINDINGS

FACILITY DESCRIPTION AND OPERATIONS

This image shows a single page of white paper with horizontal blue or grey ruling lines. The lines are evenly spaced and run across the width of the page. There is no handwriting or printed text on the page.

SUMMARY OF FINDINGS

FACILITY DESCRIPTION AND OPERATIONS

This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

Describe the activities that result in the generation of hazardous waste.

After experiments labs are cleaned out of chemicals and solvents and stored in 55 gal drums.

Print thinner from paint shop.

R + D on printed circuits produce waste etching solutions and caustics (ammonium hydroxide)

Waste oil from servicing company owned vehicles and service machinery. (-saw motor etc)

Identify the hazardous waste located on site, and estimate the approximate quantities of each.

(Identify Waste Codes)

3100 gal in 6000 gal tank - last addition in 9-30-86

Rinse water, mixed aqueous wastes X900

Drum Storage Area

1 x 55 gal steel drum Flammable paint thinner D001

1 x 55 gal steel drum Non chlorinated solvent F003

1 x 55 gal steel drum Mixed chlorinated solvents F002

1 x 55 gal steel drum Waste corrosive solid D002

Inventory of hazardous wastes stored in

Room No 1 for acids and oxidizers,

Room No 2 for caustics and cyanides and

Cabinet near Rooms No 1 + No 2 for flammable and reactives is attached to this report.

7:26-9.4(b)

WASTE ANALYSIS

7:26-9.4(b)11

Is there a detailed chemical and physical analysis of a representative sample of the waste(s) or each waste? (At a minimum, this analysis must contain all the information necessary for proper treatment, storage or disposal of the waste).

✓ — —

7:26-9.4(b)1111

Does the character of the waste handled at the facility change from day to day, week to week, etc., thus requiring frequent testing?
Check only one:

Waste characteristics vary

✓

All waste(s) are basically the same

—

Company treats all waste(s) as hazardous

—

7:26-9.4(b)2

Is there a written waste analysis plan at the facility?

✓ — —

Does it contain:

7:26-9.4(b)21

Parameters for which each hazardous waste stream will be analyzed including constituents listed in NJAC 7:26-8.16 and the rationale for the selection of these parameters?

✓ — —

7:26-9.4(b)211

The test methods which will be used to test for these parameters?

✓ — —

7:26-9.4(b)2111

The sampling method which will be used to obtain a representative sample of the waste to be analyzed?

✓ — —

7:26-9.4(b)21v

The frequency with which the initial analysis of the waste will be reviewed or repeated to ensure that the analysis is accurate and up-to-date?

✓ — —

7:26-9.4(b)2v

For off-site facilities, the waste analysis that hazardous waste generators have agreed to supply?

✓ — —

7:26-9.4(b)2v11

Procedures which will be used to identify changes in waste stream characteristics?

✓ — —

7:26-9.4(b)3

Did the owner or operator submit the waste analysis plan to the Department?

✓ — —

If yes, when was the plan submitted?

Aug 1987

The WAP is being reviewed
by the Dep. at present.

YES NO N/A

7:26-9.4(b)4

If waste comes from an outside source, are there procedures in the waste analysis plan to insure that waste received conforms to the accompanying manifest?

✓ — —

Does the plan describe:

7:26-9.4(b)4i

The procedures which will be used to determine the identity of each shipment of waste managed at the facility?

✓ — —

7:26-9.4(b)4ii

The sampling method which will be used to obtain a representative sample of the waste to be identified, if the identification method includes sampling?

✓ — —

7:26-9.4(c)1

Did the facility accept hazardous waste which it is not authorized to handle?

— ~~2~~ ✓ ^{h2y} —

7:26-9.4i

Are all records and results of waste analysis performed pursuant to NJAC 7:26-9.4(b), 9.4(e) and 10.1 et seq applicable written in the operating log?

✓ — —

7:26-9.4(h)

Security

Does the facility have:

7:26-9.4(h)1i

a 24 hour surveillance system which continuously monitors and controls entry onto the active portion of the facility?

✓ — —

7:26-9.4(h)1ii

An artificial or natural barrier, which completely surrounds the active portion of the facility; and a means to control entry, at all times, through the gates or other entrances to the active portion of the facility?

✓ — —

7:26-9.4(h)3

Are there "Danger-Unauthorized Personnel Keep Out" signs posted at each entrance to the facility?

✓ — —

If no, explain what measures are taken for security.

7:26-9.4(f)

General Inspection Requirements

7:26-9.4(f)1

Does the owner or operator inspect the facility for malfunctions and deterioration, operator errors and discharges which may be causing, or may lead to:

7:26-9.4(f)1i

Discharge of hazardous waste constituents to the environment?

✓ — —

7:26-9.4(f)1ii

A threat to human health?

✓ — —

7:26-9.4(f)3

Has the owner or operator developed, and does the owner or operator follow a written schedule for inspecting monitoring equipment, safety and emergency equipment, security devices, and operating and structural equipment that are utilized for the prevention, detection or response to environmental or human health?

✓ — —

7:26-9.4(f)3i

Did the owner or operator submit the written inspection schedule to the Department?

✓ — —

If yes, when was it submitted?

May 1986

7:26-9.4(f)3iii

Is the written inspection schedule kept at the facility?

✓ — —

YES NO N/A

7:26-9.4(f)3iv

Does the schedule identify the types of problems to be looked for during the inspection?

✓

7:26-9.4(f)3v

Does the schedule include the frequency of inspection, based upon the rate of possible deterioration of the equipment and the probability of an environmental, or human health incident if the deterioration or malfunctions or any operator error goes undetected between inspections?

✓

7:26-9.4(f)5

Is there evidence that problems reported in the inspection log have been remedied?

 ✓

7:26-9.4(f)6

Does the owner/operator record inspections in a log?

✓

Are these records kept for at least three (3) years from the date of inspection?

✓

Does the record include the date, and time of the inspection, the name of the inspector, a notation of the observations made, and the date and nature of any repairs or other remedial action?

✓

7:26-9.4(g)

Personnel training

Have facility personnel successfully completed a program of classroom instruction or on-the-job training within 6 months of having been employed?

✓
— — —

7:26-9.4(g)2

Is the program directed by a person trained in hazardous waste management procedures and does it include instruction which teaches facility personnel hazardous waste management procedures (including contingency plan implementation) relevant to the positions in which they are employed?

✓
— — —

7:26-9.4(g)5

If yes, have facility personnel taken part in an annual review or training?

✓
— — —

Is there written documentation of the following:

— — —

7:26-9.4(g)6i

Job title for each position at the facility related to hazardous waste management, and the name of the employee filling each job?

✓
— — —

7:26-9.4(g)6ii

A written job description for each position related to hazardous waste management?

✓
— — —

7:26-9.4(g)6iii

A written description of the type and amount of both introductory and continuing training given to personnel in jobs related to hazardous waste management?

✓
— — —

7:26-9.4(g)6iv

Documentation of actual training or experience received by personnel?

✓
— — —

7:26-9.4(g)7

Are training records kept on all current employees until closure of the facility and training records kept on former employees for 3 years from their last date of employment?

✓
— — —

7:26-9.4(g)8

Are semiannual drills conducted involving all employees and appropriate local authorities to test emergency response capabilities at the facility in accordance with the contingency plan and emergency procedures development pursuant to NJAC 7:26-9.7?

— ✓ —

If no, did the owner or operator petition the Department for exemption?

— ✓ —

		YES	NO	N/A
7:26-9.4(g)81	From the semiannual drill requirements an exemption	—	—	✓
7:26-9.4(g)81i	From the involvement of some or all local officials in the semiannual drill, providing the Department has received their written permission.	—	—	✓
7:26-9.6	<u>Preparedness and prevention</u>			
7:26-9.6(b)	Does the facility comply with preparedness and prevention requirements including maintaining:	—	—	—
7:26-9.6(b)1	An internal communications or alarm system?	✓	—	—
7:26-9.6(b)2	A telephone or other device to summon emergency assistance from local authorities?	✓	—	—
7:26-9.6(b)3	Portable fire equipment, spill control equipment, and decontamination equipment?	✓	—	—
7:26-9.6(b)4	Water at adequate volume and pressure to supply water hose streams, or foam producing equipment, or automatic sprinklers, or water spray systems?	✓	—	—
7:26-9.6(c)	Is equipment tested and maintained?	✓	—	—
7:26-9.6(d)1	Is there immediate access to communications or alarm systems during handling of hazardous waste?	✓	—	—
7:26-9.6(e)	Adequate aisle space to allow unobstructed movement of personnel fore protection equipment, spill control equipment and decontamination equipment?	✓	—	—
	If no please explain.			
	In your opinion, do the types of waste on site require all of the above procedures, or are some not required?	✓	—	—
	Explain.			
7:26-9.6(f)	Has the facility made the following arrangements, as appropriate for the type of waste handled on site?	—	—	—
7:26-9.6(f)1	Familiarize police, fire departments and emergency response teams with the layout of the facility and hazardous waste handled?	✓	—	—

7:26-9.6(f)2	Where more than one police and fire department might respond to an emergency, is there an agreement designating primary emergency authority to a specific police or fire department, and agreements with any others to provide support to the primary emergency authority?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.6(f)3	Agreements with emergency response contractors, and equipment suppliers?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.6(f)4	Arrangements to familiarize local hospitals with the properties of hazardous waste handled at the facility and the types of injuries or illnesses which could result from fires, explosions, or discharges at the facility?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.6(f)5	Arrangements with local fire departments to inspect the facility on a regular basis with at least two (2) inspections annually?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.6(f)6	Has the facility documented when local authorities (i.e., hospitals, police and fire departments) declined to enter into the arrangements noted in (f) through (s)?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

YES NO N/A

7:26-9.7

Contingency plan and emergency procedures

7:26-9.7(a)

Does the facility have a written contingency plan for emergency procedures designed to deal with fires, explosions, hazards to human health or environment, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil or surface water?

✓

7:26-9.7(b)

Are provisions of the plan carried out immediately whenever there is a fire, explosion, or release of hazardous waste or hazardous waste constituents which could threaten human health or the environment?

✓

7:26-9.7(c)

Does the contingency plan describe the actions facility personnel shall take in response to fires, explosions, or any unplanned sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water at the facility?

✓

7:26-9.7(d)

Did the owner or operator prepare a Spill Prevention, Control, and Countermeasures (SPCC) Plan in accordance with 40 CFR 112 or 151 or a Discharge Prevention, Containment and Countermeasure (DPCC) Plan in accordance with N.J.A.C. 7:1E-4.1 et seq.?

✓

If yes, did the owner or operator amend that plan to incorporate hazardous waste management provisions that are sufficient to comply with the requirements of this section?

✓

7:26-9.7(e)

Does the plan describe arrangements agreed to by local police departments, fire departments, hospitals, contractors, and State and local emergency response teams to coordinate emergency services?

✓

7:26-9.7(f)

Does the plan list names, addresses, and phone numbers (office and home) of all persons qualified to act as emergency coordinator and is this list kept up-to-date? Where more than one person is listed, one shall be named as primary emergency coordinator and others shall assume responsibility as alternates.

✓

7:26-9.7(g)

Does the plan include a list of all emergency equipment at the facility (such as fire extinguishing systems, spill control equipment, communications and alarm systems (internal and external, and decontamination equipment), where this equipment is required? Is the list kept up-to-date? In addition, does the plan include the location and a physical description of each item on the list, and a brief outline of its capabilities?

✓

7:26-9.7(h)

Does the plan include an evacuation procedure for facility personnel where there is a possibility that evacuation could be necessary? Does this plan describe signal(s) to be used to begin evacuation, evacuation routes, and alternative evacuation routes (in case where the primary routes could be blocked by releases of hazardous waste or fires)?

✓

7:26-9.7(i)

Is copy of the contingency plan and all revisions to the plan:

1. Maintained at the facility; and
2. Has the contingency plan been submitted to local authorities (police, fire departments, emergency response teams)?

✓

7:26-9.7(k)

Is there an employee on-site or on call at all times with the responsibility for coordinating all emergency response measures?

✓

YES NO N/A

7:26-9.8

Closure plan

7:26-9.8(c)

Does the facility have a written closure plan?

✓ — —

Does the owner/operator keep a written copy of the closure plan and all revisions to the plan at the facility?

✓ — —

If yes, does the plan include:

7:26-9.8(e)11

A description of how and when the facility will be partially closed (if applicable) and ultimately closed?

✓ — —

7:26-9.8(e)111

The maximum extent of the operation which will be open during the life of the facility?

✓ — —

7:26-9.8(e)2

An estimate of the maximum inventory of wastes in storage or in treatment at any given time during the life of the facility?

✓ — —

7:26-9.8(e)3

A description of the steps needed to decontaminate facility equipment during closure?

✓ — —

7:26-9.8(e)4

A schedule for final closure including the anticipated date when the wastes will no longer be received, the date when completion of final closure is anticipated, and intervening milestone dates which will allow tracking of the progress of closure?

✓ — —

Post Closure Plan

7:26-9.9(g)

Does the facility have a written post-closure plan kept at the facility?

✓

If yes, does the plan:

7:26-9.9(i)

Identify the activities which will be carried on after closure and the frequency of these activities?

7:26-9.9(i)1

Include a description of the planned ground-water monitoring activities and frequencies at which they will be performed?

7:26-9.9(i)2

Include a description of the planned maintenance activities, and frequency at which they will be performed, to ensure the following:

7:26-9.9(i)21

The integrity of the cap and final cover or other containment structures where applicable?

7:26-9.9(i)211

Describe the function of the facility monitoring equipment?

7:26-9.9(i)3

Include the name, address and phone number of a person or office to contact about the disposal facility during the post-closure period?

Does the owner/operator have a written estimate of the cost of post-closure for the facility?

If yes, what is it?

Please circle all appropriate activities and answer questions in appropriate sections for all activities circled.

StorageTreatmentDisposal

Container

Tank

Landfill -

Tank, above ground

Surface Impoundments

Tank, below ground

Incineration

Surface Impoundments -

Surface Impoundments

Thermal Treatment

Other _____

Other _____

Chemical, Physical and
Biological Treatment - pg. 25

Other _____

7:26-9.4(d)

Containers

What type of containers are used for storage?
Describe the size, type, quantity and nature
of wastes (e.g., 12 fifty-five gallon drums
of waste acetone)

See Page 6

7:26-10.4(b)1

Is there a containment system for spills,
leaks and precipitation?

If yes, describe the containment system.

6" concrete curbing
pad sloped to drain.

7:26-10.4(b)1i

Is the base underlying the containers free of
cracks or gaps and impervious to the materials
to be stored?

7:26-10.4(b)1ii

Is the containment materials compatible with
the waste being stored?

7:26-10.4(b)1iii

Is the containment system designed to
efficiently drain or remove liquids
resulting from spills, leaks or precipitation?
Are containers protected from contact with
accumulated liquids?

7:26-10.4(b)1iv

Is the containment system of sufficient capacity
to contain ten percent of the volume of all
containers or the volume of the largest
container?

7:26-10.4(b)2

Is runoff into the containment system prevented?

7:26-10.4(b)3

Is accumulated precipitation removed from the
sump or collection area in a timely manner?

7:26-10.4(b)4

Is spilled or leaked waste removed from the
sump or collection area daily?

7:26-9.4(d)1i

Do the containers appear to be of sturdy leak-
proof construction of adequate wall thickness,
weld, hinge and seam strength, and of
sufficient material strength to withstand
side and bottom shock, while filled, without
impairment of the container's ability to
contain hazardous waste?

If no, explain.

YES NO N/A

7:26-9.4(d)1ii	Are the lids, caps, hinges or other closure devices of sufficient strength that when closed, they will withstand dropping, overturning or other shock without impairment of the container's ability to contain hazardous waste?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, please explain.			
7:26-9.6(e)	Adequate aisle space (18") to allow unobstructed movement of personnel fire protection equipment, spill control equipment and decontamination equipment?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)2	Do the containers appear to be in good condition, not in danger of leaking?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)2	If not, please describe the type, condition and number of leaking or corroded containers. Be detailed and specific.			
7:26-9.4(d)3	Are hazardous wastes stored in containers made of compatible materials?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)4i	Are all containers securely closed, except those in use, so that there is no escape of hazardous waste or its vapors?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(d)4iii	Do containers appear to be properly opened, handled or stored in a manner which will minimize the risk of the container rupturing or leaking?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
	If no, explain.			
7:26-9.4(d)4iv	Are containerized hazardous wastes segregated in storage by waste type?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)4v	Are containerized hazardous wastes arranged so that their identification label is visible?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)5	Does the owner/operator inspect and document the container storage area at least daily, looking for leaks and for deterioration caused by corrosion or other factors?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)6	Are containers holding ignitable and reactive waste located at least 50 feet (15 meters) away from the facility's property line?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7:26-9.4(d)7i	Are incompatible waste, or incompatible wastes and materials placed in the same container?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
	If yes, explain.			

		<u>YES</u>	<u>NO</u>	<u>N/A</u>
7:26-9.4(d)7ii	Are hazardous waste placed in unwashed containers that previously held incompatible wastes?		✓	
	If yes, explain.			
7:26-9.4(d)7iii	Are containers holding hazardous waste that are incompatible with any waste or other materials stored nearby in other containers, open tanks, or surface impoundments separated from the other materials or protected from them by means of a dike, berm, wall or other device?	✓		
7:26-9.4(e)1ii	Are ignitable, reactive or incompatible wastes protected from sources of ignition or reaction?	✓		
	If no, explain.			
7:26-9.4(e)1iii	Does the owner/operator confine smoking and open flames to specially designated locations when ignitable or reactive wastes are being handled?	✓		
	If no, explain.			
7:26-9.4(e)1iii	Does the owner/operator conspicuously place "No Smoking" signs whenever there is a hazard from ignitable or reactive waste?	✓		
	If the treatment, storage or disposal of ignitable or reactive waste, and the mixture of incompatible wastes and materials, conducted so that it does not:			
7:26-9.4(e)2i	Generate extreme heat or pressure, fire or explosion, or violent reaction?	✓		
7:26-9.4(e)2ii	Produce uncontrolled toxic mists, fumes, dusts, or gases in sufficient quantities to threaten human health?	✓		
7:26-9.4(e)2iii	Produce uncontrolled flammable fumes or gases in sufficient quantities to pose a risk of fire or explosion?	✓		
7:26-9.4(e)2iv	Damage the structural integrity of the device or facility containing the waste?	✓		

YES NO N/A

7:26-9.4(e)2v	Threaten human health or the environment?	✓	—	—
7:26-10.5	<u>Tanks</u>			
	What are the number and approximate size of tanks containing hazardous waste? Identify the waste stored/treated in each tank.	1 x 6000 gal vaulted steel tank. Waste rinse waters stored in tank		
7:26-10.5(b)1	Are tanks of sufficient shell strength and, for closed tanks, do they have pressure controls to assure that they do not collapse or rupture?	✓	—	—
7:26-10.5(c)1	Are wastes stored which are incompatible with the materials used in construction of the tanks?	—	✓	—
7:26-10.5(c)2	Are there controls to control:			
7:26-10.5(c)2i	Overfilling (ie. waste feed cutoff system).			
7:26-10.5(c)2ii	For uncovered tanks, is there at least 2 feet (60 cm) of freeboard or an amount of freeboard which is acceptable to the Department? (Documentation required)	✓	—	—
7:26-10.5(d)1	Do aboveground storage tanks have containment systems capable of collecting and holding spills, leaks and precipitation?	✓	—	—
7:26-10.5(d)1i	Is the base underlying the tanks free of cracks or gaps and impervious to certain spills, leaks and accumulating rainfall until it is collected?	✓	—	—
7:26-10.5(d)1ii	Is the containment system compatible with the wastes being stored?	✓	—	—
7:26-10.5(d)1iii	Is the containment system sloped or designed to efficiently drain and remove liquids resulting from leaks, spills and precipitation? Are tanks protected from accumulated liquids?	✓	—	—
7:26-10.5(d)1v	Is the containment system of sufficient capacity to contain ten percent of the volume of all tanks or the volume of the largest tank, whichever is greatest?	✓	—	—
7:26-10.5(d)2	Is runoff into the containment system prevented?	✓	—	—
7:26-10.5(d)3	Is accumulated precipitation removed from the sump or collection area in a timely manner?	✓	—	—
7:26-10.5(d)4	Is spilled or leaked waste removed from the sump or collection area daily?	✓	—	—

YES NO N/A

7:26-10.5(e)1i Is overfilling control equipment inspected daily?

✓ — —

7:26-10.5(e)1ii Is data from monitoring equipment reviewed to assure the tank is operating according to its design?

✓ — —

7:26-10.5(e)1iv Is the level of waste in the tank checked each operating day?

✓ — —

7:26-10.5(e)lv Are the construction materials of the aboveground portion of the tank checked for corrosion or leaks each operating day?

✓ — —

7:26-10.5(e)lvi Is the area surrounding the tank checked each operating day for signs of leakage?

✓ — —

7:26-9.4f6 Are records and results of these inspections written in the operating log?
Are ignitable or reactive wastes placed in a tank?

✓ — —
— — —

7:26-10.5(i)1i If yes, was it rendered to no longer meet the criteria of ignitable or reactive wastes pursuant to NJAC 7:26-8.9 or 8.11.

or

7:26-10.5(i)1ii Is it stored or treated in such a way that it is protected from any material or conditions which may cause it to ignite or react.

or

7:26-10.5(i)1iii The tank is used solely for emergencies?

✓ — —

7:26-10.5(j)1 Are incompatible wastes placed in the same tank?

— ✓ —

7:26-9.2(b) Are there underground tanks used to store hazardous waste?

— ✓ —

If yes, how many and can they be entered for inspection?

What is the tank capacity and waste material is stored?

— — ✓

Has the underground tank been in use on or before November 19, 1980? Specify date.

— — ✓

If no, when was the tank placed in use?

7:26-9.2(b)31	Does the facility have a groundwater monitoring plan approved by the Department?	Not required		
7:26-9.2(b)311	Is the use of the tank specified to the manufacturer's recommended lifetime?			✓
7:26-10.5(e)6	Are the underground tanks subjected to periodic integrity testing?			✓
7:26-10.6	<u>Surface Impoundments</u> N/A			
	Describe the design and operating features of the surface impoundment to prevent groundwater contamination (e.g., liner leachate collection system).			
	Give the approximate size of surface impoundments (gallons or cubic feet). Please specify the types of waste stored and treated.			
7:26-10.6(e)2	Is there at least 2 feet of freeboard in the impoundment?			
7:26-10.6(c)4	Do all earthen dikes have a protective cover to preserve their structural integrity?			
	If yes, please specify the type of covering.			
7:26-9.4(b)1	Does the owner/operator have a detailed chemical and physical analysis of a representative sample of the waste in the impoundment?			
7:26-9.4(c)2	Does the owner/operator place the results from each waste analysis and trial test, or the documented information, in the operating record of the facility?			
7:26-10.6(f)	Does the owner or operator inspect each operating day?			
7:26-10.6(f)21	The freeboard level at least once each operating day to ensure compliance with subsection 10.6(e)2?			
7:26-10.6(f)2111	The surface impoundment, including dikes and vegetation surrounding the dike, at least once a week to detect any leaks, deterioration or failures in the impoundment?			

7:26-11.6

Thermal Treatment

N/A

What type of thermal treatment is at the site
(e.g., waterwall incinerator, boiler,
fluidized bed, etc.)?

List the types and quantities of hazardous
waste thermally treated.

Is the residue from the thermal treatment unit
a hazardous waste?

What types of air pollution control devices
(if any) are installed in the thermal treat-
ment unit?

SITE SPECIFIC RCRA INSPECTION CHECKLIST FOR:

AT&T Bell Laboratories
Crawfords Corner Road
Holmdel, NJ 07733
Permit #1318G1HP01

	<u>Yes</u>	<u>No</u>
1. <u>Monitoring and Records</u> - Condition 10 - Section I		
(a) Are records retained of all monitoring information, copies of all reports required by this permit, for a period of at least three years from date of the sample, measurement, report or application?	<u>✓</u>	<u> </u>
(b) Is the following information included in the monitoring records:		
1. The date, exact place and time of sampling of measurement?	<u>✓</u>	<u> </u>
2. The individual(s) who performed the sampling or measurement?	<u>✓</u>	<u> </u>
3. The date analyses were performed?	<u>✓</u>	<u> </u>
4. The individual who performed the analyses?	<u>✓</u>	<u> </u>
5. The analytical technique or methods used?	<u>✓</u>	<u> </u>
6. The results of each analysis?	<u>✓</u>	<u> </u>
2. <u>Authorized Activities</u> - Condition 2 - Section II		
(a) <u>Container (Drum) Storage</u>		
1. Are spent etching solution, paint thinner waste, and spent solvent that are generated on-site as well as wastes generated at company-owned off-site locations stored on the diked concrete pad (14' 2" L x 39' 6" W x 6" H)?	<u>✓</u>	<u> </u>
2. Are the containers stored within the diked area on wooden pallets?	<u>✓</u>	<u> </u>
3. Are no more than 935 gallons of liquids contained in 17 x 55 gallon containers or equivalent volume of 30 gallon drums in storage?	<u>✓</u>	<u> </u>
(b) <u>Small Container Storage</u>		
1. Are 40 gallons of liquids, semi-solids, semi-liquids or solids in plastic or glass bottles, jugs, jars, etc. stored in a cabinet in masonry room No. 1 for acids and oxidizers?	<u>✓</u>	<u> </u>

- | | <u>Yes</u> | <u>No</u> |
|---|------------|-------------|
| 2. Are 40 gallons of liquids, semi-solids, semi-liquids or solids in plastic or glass bottles, jars, jugs, etc. stored in a cabinet in masonry room No. 2 for caustics and cyanides? | <u>✓</u> | <u> </u> |
| 3. Are 15 gallons of liquids, semi-liquids, semi-solids or solids in plastic or glass bottles, jars, jugs, etc. in a cabinet near masonry rooms #1 and #2 for compatible flammable and reactives? | <u>✓</u> | <u> </u> |

(c) Tank Storage

- | | | |
|--|----------|-------------|
| 1. Does the permittee store hazardous waste generated from cleanup of laboratory equipment in a 6000 gallon 0.167 inch minimum shell thickness lined carbon steel tank which sits in a roofed concrete vault with a tank area of 11' 0" L x 21' 0" W x 12' 5" H and a concrete base of a minimum 6 inches thickness? | <u>✓</u> | <u> </u> |
| 2. Does the permitted use the waste pouring station and associated piping leading to the tank for transfer of wastes from containers into the tank? | <u>✓</u> | <u> </u> |
| 3. Is this transfer performed manually and the tank contents pumped out for off-site treatment or disposal when the capacity reached approximately 5000 gallons? | <u>✓</u> | <u> </u> |
| 4. Is the lid in the pouring station kept in the closed position when waste transfer operations are not being conducted? | <u>✓</u> | <u> </u> |
| 5. Is base of the containment vault free of gaps and cracks? | <u>✓</u> | <u> </u> |

3. Permitted Waste Types - Condition 3 - Section II

- (a) The permittee is authorized to store the following types of on-site generated wastes, as well as wastes generated at company-owned off-site locations, in 55 gallon or 30 gallon containers at the facility.

NJDEP Hazardous Waste NOS

D001	Ignitable
D002	Corrosive
F001	Constituents listed in N.J.A.C. 7:26-8.13(a)
F002	Constituents listed in N.J.A.C. 7:26-8.13(a)
F003	Constituents listed in N.J.A.C. 7:26-8.13(a)
F004	Constituents listed in N.J.A.C. 7:26-8.13(a)
F005	Constituents listed in N.J.A.C. 7:26-8.13(a)

Authorized waste types which may be stored in small containers (bottles, jars, jugs, etc.) at the indoor small containerized waste storage areas:

D001	Ignitable
D002	Corrosive
D003	Reactive (Potassium Borohydride, Rubidium, Barium, Sodium in Solvent, Calcium Turnings, Magnesium Powder)
D004	EP Toxic Arsenic
D005	EP Toxic Barium
D006	EP Toxic Cadmium
D007	EP Toxic Chromium
D008	EP Toxic Lead
D009	EP Toxic Mercury
D010	EP Toxic Selenium
D011	EP Toxic Silver
F001	Constituents listed in N.J.A.C. 7:26-8.13(a)
F002	Constituents listed in N.J.A.C. 7:26-8.13(a)
F003	Constituents listed in N.J.A.C. 7:26-8.13(a)
F004	Constituents listed in N.J.A.C. 7:26-8.13(a)
F005	Constituents listed in N.J.A.C. 7:26-8.13(a)
F007	Constituents listed in N.J.A.C. 7:26-8.13(a)
X721	Waste automotive crankcase and lubricating oils.
X725	Oil spill cleanup residue which: A. is contaminated beyond saturation; or B. the generator fails to demonstrate that the spilled material was not one of the listed hazardous waste oils.
X726	The following used and unused waste oils: Metal working oils, turbine lubricating oils, diesel lubricating oils; and quenching oils.
X727	Waste oil from the draining, cleaning or disposal of electric transformers with PCBs less than 50 ppm.

"P" Code Numbers	Any discarded commercial chemical products, off-specification species, and spill residues thereof which are listed in N.J.A.C. 7:26-8.15(e).
------------------	--

"U" Code Numbers	Any discarded commercial chemical products, off-specification species, and spill residues thereof which are listed in N.J.A.C. 7:26-8.15(f).
------------------	--

"C" Code Numbers	Any waste streams containing the hazardous constituents under hazardous waste "C" Code Numbers listed in N.J.A.C. 7:26-8.16(a).
------------------	---

The permittee must obtain necessary approvals from the USEPA before storage of polychlorinated biphenyl, N.O.S. under the C387 waste code if the concentration of PCBs is equal to, or in excess of, 50 ppm.

The permittee is also authorized to store in small containers non-hazardous waste being managed as hazardous waste under the following code:

<u>NJDEP Hazardous Waste Numbers</u>	<u>Description of Hazardous Waste</u>
X850	Packed laboratory chemicals
X900	Non-hazardous liquid waste
X910	Non-hazardous solid waste
X940	Poisons and pesticides, N.O.S.

The permitted is authorized to store in the tank laboratory rinse waters and aqueous wastes generated on-site from the research and development laboratories, as well as waste generated at company owned off-site location, which are hazardous for the following characteristics:

<u>NJDEP Hazardous Waste Numbers</u>	<u>Description of Hazardous Waste</u>
D002	Corrosive
D004	EP Toxic Arsenic
D005	EP Toxic Barium
D006	EP Toxic Cadmium
D007	EP Toxic Chromium
D008	EP Toxic Lead
D009	EP Toxic Mercury
D010	EP Toxic Selenium
D011	EP Toxic Silver

The permittee is also authorized to store in the tank non-hazardous laboratory rinse waters and other non-hazardous aqueous wastes not meeting the criteria of hazardous waste under N.J.A.C. 7:26-8.1 et seq., provided said waste managed as hazardous waste under the following code:

<u>NJDEP Hazardous Waste Numbers</u>	<u>Description of Hazardous Waste</u>
X900	Non-hazardous liquid waste

	<u>Yes</u>	<u>No</u>
Are all wastes stored on-site authorized wastes?	<u>✓</u>	<u> </u>

If no, list those wastes not authorized -

4. Waste Analysis and Quality Assurance Requirements

Does the permittee comply with the following requirements for Waste Analysis and Quality Assurance:

- | | <u>Yes</u> | <u>No</u> |
|--|------------|---------------|
| a. For each waste stream, the permittee shall complete an Unwanted Chemical Removal Tag or Spent Etching Disposal Tag. For each small container of hazardous waste to be stored in the cabinets, the permittee shall also complete a Waste Data Sheet (WDS). Each WDS, Unwanted Chemical Removal Tag and Spent Etching Disposal Tag shall contain, at a minimum, the same information as the sample forms provided in the Part B application cited in Condition 1(a) of Section II of this permit. | <u>✓</u> | <u> </u> |
| b. For each waste, a Waste Chemical Management Facility (WCMF) Technician of AT&T Bell Laboratories shall review the information on the applicable WDS, Unwanted Chemical Removal Tag or Spent Etching Disposal Tag to determine appropriate classification and storage areas. If the waste meets appropriate classification and storage requirements as authorized by Conditions 2 and 3 of Section II, then the permittee may accept the container of waste for storage at the facility. | <u>✓</u> | <u> </u> |
| c. The waste need not be analyzed unless the permittee has reason to believe it is not as represented on the WDS, Unwanted Chemical Removal Tag or Spent Etching Disposal Tag. | <u>✓</u> | <u> </u> |
| d. The permittee shall review and update as necessary each tag on a yearly basis. Also, whenever a process generating a particular waste is changed, the WDS, Unwanted Removal Tag and Spent Etching Disposal tag for that waste shall be modified as necessary. | <u>✓</u> | <u> </u> |
| e. Prior to the addition of any waste to the tank, the waste shall be tested for compatibility with the hazardous wastes already stored in the tank. Compatibility shall be determined by mixing 5 milliliters of the waste with 50 milliliters of the tank's contents to confirm the absence of gas evolution, fumes or changes in temperature. Incompatible wastes shall not be added to the tank. | <u>✓</u> | <u> </u> |
| f. The permittee shall maintain a log book for the hazardous waste storage tank with a record of all additions: Date, waste type, quantity and the name of the person performing the addition. | <u>✓</u> | <u> </u> |

- | | <u>Yes</u> | <u>No</u> |
|---|------------|---------------|
| g. Prior to shipment of waste from the tank to an authorized off-site disposal facility, the permittee shall collect a representative sample and have it analyzed for pH, arsenic, lead and mercury. | <u>✓</u> | <u> </u> |
| h. Prior to the addition of any waste to a drum, the waste shall be tested for compatibility with the wastes already stored in the drum. The compatibility test shall be by the same method as described in Condition 4(e) of Section II above. Incompatible hazardous wastes shall not be added to a drum. | <u>✓</u> | <u> </u> |
| i. The permittee shall maintain a separate log book for the wastes stored in drums with a record of all additions: Drum identification, date, waste type, quantity and the name of the person performing the addition. | <u>✓</u> | <u> </u> |
| j. The permittee does not need to analyze the content of a filled drum provided the log book provides sufficient information to characterize the waste. | <u>✓</u> | <u> </u> |
| k. All analyses on the waste performed by the permittee shall be performed in accordance with the Quality Assurance/Quality Control methods established by the Division of Hazardous Waste Management. A copy of all waste testing results shall be retained for a minimum of three years. | <u>✓</u> | <u> </u> |

5. Inspection Requirements

Are the items in the following table inspected for at the frequency stated?

a. Container (Drum) Storage Area

<u>Activity/Equipment</u>	<u>Inspected For</u>	<u>Frequency</u>		
Container Placement	Minimum 18" Aisle Neat, Stable	Daily	<u>✓</u>	<u> </u>
Container Sealing	All Bungs and Covers	Daily	<u>✓</u>	<u> </u>
Container Labeling	Labels Complete	Daily	<u>✓</u>	<u> </u>
Container Condition	Leaks, Deterioration	Daily	<u>✓</u>	<u> </u>
Pad Area	Cracks	Weekly	<u>✓</u>	<u> </u>
Dike Walls	Cracks	Weekly	<u>✓</u>	<u> </u>

			<u>Yes</u>	<u>No</u>
Drain Valve	Operation and Position	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Shower and Eyewash	Operational Condition	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Container Location By Type	Segregation Per Condition 3 for Section II	Daily	<input checked="" type="checkbox"/>	<input type="checkbox"/>

b. Small Container Storage Area

<u>Activity/Equipment</u>	<u>Inspected For</u>	<u>Frequency</u>		
Container Labeling	Labels Complete	Daily	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Container Condition	Leaks	Daily	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Container Sealing	Covers	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Reservoir	Standing Leaks, Cracks	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Container Location	Segregation Per Condition 3 for Section II	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>

c. Tank Storage Area

<u>Activity/Equipment</u>	<u>Inspected For</u>	<u>Frequency</u>		
Tank Condition	Leaks, Stains	Daily	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Waste in the Tank	Level	Daily	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Tank Shell Thickness	Shell Thickness	Every 3 Years	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Dike Walls	Cracks	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Vault Base	Standing Water, Cracks	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Pipes	Supported, No Leaks	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Loading Pad Drain	Operational	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>
Ladder and Platform	Structural Defects	Weekly	<input checked="" type="checkbox"/>	<input type="checkbox"/>

d. Security

<u>Activity/Equipment</u>	<u>Inspected For</u>	<u>Frequency</u>		
Fence	Functional	Weekly	<u>✓</u>	<u> </u>
Lock on Gate of Fence	Position - Close or Open	Daily	<u>✓</u>	<u> </u>

If no, list those items not inspected and the reason why:

Is a written log of all inspections kept on-site
including date and time of each inspection, the names
of the inspectors, and the date and nature of any remedial
actions performed?

Yes No

✓

Peter Marini
4-10-89

#1



CONTAINER STORAGE LOG

Hcids

1

Date Stored	Container		Item	Waste Type	Date Removed	Doc. No.
Vol.	Lbs.					
3/3/88	6 bags	50 lbs	Lead, Tin Filters	D008 D008	4/11/88	
3/3/88	2	2 lbs	Copper Sulfate & Aqueous H ₂ O ₂	D002		
3/30/88	2 x 1 lb	2 lbs	Ammonium Persulfate	D001		
3/30/88	1	1 lb	Potassium Nitrate			
3/30/88	1	1 lb	Chromium Trioxide			
3/30/88	14	1 lb	Potassium Dichromate			
3/30/88	12	1 lb	Sodium Nitrate			
3/30/88	22	1 lb	Sodium Nitrite			
3/30/88	1 can	2 lbs 9 oz	Acid Salts	D002	4/11/88	
6/9/88	1 BAG	5 lbs	PHOSPHORIC ACID	D002	6/13/88	
6/9/88	1 BAG	5 lbs	10% (10% stock) CLOVES	D010	6/13/88	
10/14/88			AETC in LAB PACK			
12/14/88	1 BOX		UNACCEPTABLE MAT. from waste guide			see break down below
12/14/88	1 BOX	1 lb	UNKNOWN	X940	12/27/88	
12/27/88			AETC in FOR LAB PACK			
12/14/88	4 containers	total wgt 3 lbs	BeO	X940		
"	2 cont	5 lbs	Thallium nitrate	U217		
"	4 cont	1 3/4 lbs	Hg nitrate	D008		
"	1 cont	1 lb	Hg oxide	D008		
"	1 cont	1/4 lb	Hg chloride	D008		
"	9 cont	9 gm	Osmium tetroxide	X940		
"	5 cont	5 lbs	Vanadium pentoxide	P120		
"	1 cont	1 lb	Zinc selenide	D010		
"	"	10 gm	Antimony telluride	X940		
"	"	1 gm	Germanium selenide	D010		
1/3/89	5 lbs		Al ₂ O ₃ filter w/ 0.1 + P	X726		

Acids

Date Stored	Container		Item	Waste Type	Date Removed	Doc. No.
	Vol.	Lbs.				
1/3/89	1 gal	30 gm	Cel Se			
1/3/89		10 gm	Cd Se			
1/3/89		1 gm	Palladium Chloride			
1/17/89	3-1 gal	CANS	PURAFIL II		3/27/89	
1/17/89	2-5 gal	pal	Endura ERK		3/27/89	
1/17/89	1 gal	1 lb	1 lb			
1/30/89	1	1	PUMP OIL NACH LIQUID TEFLON CONTAM. WITH CH ₂			
1/16/89	2 CANS	1/2 gal (1 lb)	CONATHANE PART A+B		3/27/89	
-16-89	GAL	9	NEOPRENE ADHESIVE	SOLID	3/27/89	
-16-89	4 QTS	9	COMPOXY	VISCID	3/27/89	
-16-89		100 gm	Thorium Oxyluoride			
3-16-89		5 gm	Xenon Difluoride			
3-16-89	lecture bottle		Nitrogen Trifluoride			
3-16-89		1 lb	Ammonium Persulfate			
3-16-89		1 lb	Epoxy Resin			
3-16-89	6 x 25 ml		Chromium Trioxide			
3-16-89	18 x 40 gm		Disocyanate Polyurethane prepolymer			
3-16-89	4 x 125 gm		Polyurethane prepolymer		3/27/89	
3-16-89		1 lb	Silicone Oil		3/27/89	
3-16-89	3 x 1/4	1 lb	polyurethane			
3-23-89	Box-LARGE	20	PHOTORESIST	SOLID	3/27/89	
3-23-89	2 x 2 1/2 gal		insecticide			
3-23-89	1 qt		Bromine			
3-23-89		2 lb	CrO ₃			
3-24-89		3 lbs	LiOxides + drier to			

CONTAINER STORAGE LOG

Date Stored	Container		Item	Waste Type	Date Removed	Doc. No.
	Vol.	Lbs.				
3-23-89	WOOD BOX	7	GAS CYLINDER	GAS	3/27/89	
3/24/89	SMALL BOTTLE		MERCURY			
3-28-89	SWITCH		MERCURY			
3-28-89	SWITCH	1	MERCURY	GAS		
3-28-89	1 PK	7	FILTER w/OIL	SOLID		
3-28-89	1 PK	1	BROMINE ITEMS	SOLID		
3-28-89	1 PK	1	BROMINE ITEMS	SOLID		
3-28-89		100gms	K ₂ FeCN			
3-28-89	1 qt		SiO ₂ ^{glass} crystal solution			
3-28-89	29 bottles (100ml)		SiO ₂ glass crystal solution			
3-28-89	1 oz		SiO			
3-28-89		2.5gm	Cyanophenyl heptybenzoate			
3-28-89		7gm	Cyanobenzylidene octyloxylaniline			
3-28-89		2.5gm	Cyanophenyl butybenzoate			
3-28-89		2.5gm	cholesteryl O-yl Carbamate			
3-28-89		2.5gm	Bis(hexyloxy)azo benzene			
3-28-89		4x1gm	methoxybenzylidene butyl aniline			
3-28-89		10gm	N-butyl ferrocene			
3-28-89		5gm	Pentylphenyl propylbenzoate			
3-28-89		3 lbs	Cb ₂ O ₅			
3-28-89		4 oz	SiO ₂ /methanol			
3-28-89		5gm	Rhodium / aqueous			
3-28-89	10 bottles	100gms	unknown lab samples			
3-28-89	10 bottles		unknown lab samples			

CONTAINER STORAGE LOG

Date Stored	Container		Item	Waste Type	Date Removed	Doc. No.
	Vol.	Lbs.				
1/3/89		5 gm	Barium Tetracyanoplatinate	0005		
1/3/89	16 x	1/16	Hg sulfide	0009		
1/1/89	16 x	1/16	Barium Tetracyanoplatinate		3/27/89	
1/1/89	16 x	1/16	Hg sulfide		3/27/89	
1/1/89	16 x	1/16	Barium Tetracyanoplatinate		3/27/89	
1/5/89	1 qt	1/16's	170 AS+ M.P. in charcoal		3/6/89	
1/9/89	1 BAG	10 USEL	1. GAL FILTER WITH SULFURIC ACID		3/6/89	
"	1 OAG		POLISHING PADS WITH SMALL AMOUNTS OF ARSENIC + GALLIUM		3/6/89	
1/16/89	4		SEALED NICKEL CADMIUM BATT.			
1/16/89	1 PLASTIC BAG	5 lbs	CONTAMINATED WITH MERCURY ZINC, CADMIUM, TELLURIUM			
1/16/89	2 YELLOW BAG		MERCURY CONTAMINATED ITEM		3/27/89	
1/17/89	1 Black garbage bag		3/16's ARSONIC		3/21/89	
1/17/89	1		MERCURY LAMP		3/27/89	
1/17/89	1		BRIKE-TRANSFER		3/27/89	
1/17/89	1 PACKAGE		CONTAINS MERCURY		3/27/89	
1/24/89	1 gal CAN		ASENTE + R102		3/21/89	
1-24-89	CONTAINS	2	BOTTLES/IN TRACES		3/21/89	
1-24-89	1 GAL	1/4	ARSENIC DUST		3/21/89	
1-24-89	1 QT	1/4	CHARCOAL/W ETC. ETC		3/6/89	
1/24/89	1 GAL	1/4	ARSENIC DUST			
1/24/89	1 QT	1/4	CHARCOAL/W ETC. ETC			
"	15 gal CAN		SOLID WASTE WITH ARSENIC		3/21/89	
2-6-89	1 QT -	1/8	MERCURIC SALTS	SOLID (H2O)		
2-6-89	1 GAL	9	PHOTO RESIST	WISCED	3/6/89	
2-6-89	1 QT	2 1/2	MICROPOSIT RESIST	LIQUID	moved to Flam Cab. net	3/28/89
2/4/89	9		SMALL NICKEL CADMIUM BATT			

CONTAINER STORAGE LOG

Date Stored	Container		Item	Waste Type	Date Removed	Doc. No.
	Vol.	Lbs.				
2-14-89	BAG	1/2	BROMINE CONTAM. ITEMS	SOLID		
2-17-89	1 PT	473 ML	FORMALDEHYDE SLN	LIQ	3/6/89	
2-17-89	1 QT	946 ML	DIM. FORMAMIDE		3/6/89	
2/20/89	1 GAL. (can)	206	USED COPPER FILTER WITH SULFATES		3/6/89	
"	1 GAL. paint can		CLOTH WITH ZINSE, GAS DUSTS		3/27/89	
"	BAG	4	MERCURY	SOLID	3/27/89	
"	BAG	1	"	"	3/27/89	
"	1/2 GAL	-	UNKNOWN	LIQ.	3/27/89	
3-24-89	VIAL	2 GM	MERCURY	LTQ	3/27/89	
"	3 GAL CAN	4	CLOTH CONTAM./DUST	SOLID	3/27/89	
"	CAN	3	.5% AS/PHOS/CHARCOAL	SOLID	3/6/89	
"	2 QTS	2	CONTAM-CHARCOAL	SOLID	3/6/89	
2-28-89	1 GAL	2	BROMINE	SOLID	3/27/89	
2-28-89	1 GAL	2	CHROMIUM OXIDE	SOLID	Moved to Acid Room	3/28/89
2-28-89	3 PTS	4	DIMETHYLFORMAMIDE	LIQ	3/6/89	
2-28-89	1/2 QT	2	"	"	3/6/89	
2-28-89	BAG	1	POT. FERR. SOD. HYD. RES	SOL.		
2-28-89	BAG	1/2	MERCURY CONT. ITEMS	SOL.	3/27/89	
2-28-89	BAG	10	ANABOLIC CHIPS	SOL.	3/27/89	
3/10/89	2		BROKEN THERMO.		3/27/89	
3/10/89	1 GAL CAN		CLOTH CONTAMINATED ZINSE, GAS		3/27/89	
3/13/89	1 PLASTIC BAG	1/2	POSITIVE PHOTO RESIST		3/27/89	
3/14/89	2 PLASTIC BAGS	1/2	POSITIVE PHOTO RESIST			
3/17/89	15 gal		TONER		3/21/89	
3-23-89	2 PTS	2	EPOXY	VISCUS	3/27/89	
"	4 GAL	16	EXPEN. GAS SCRUBBER	SOLID	3/27/89	

ROOM
#3

Flammable

CONTAINER STORAGE LOG

Date Stored	Container		Item	Waste Type	Date Removed	Doc. No.
	Vol.	Lbs.				
3/20/88	4x 1lb		Etch Resist Sensitizer	X850	4/11/88	
5/18/86	2 lb		C / As / P	D001	12/27/88	
12/11/86	10 gm 25 gm		Unknown	X910	12/27/88	Moved to Corrosive
4/6/87	100 gm		Thorium Oxide	X940	Moved to Acid Room 3/16/89	
2/11/88	5 lbs		Aluminum Oxide Filter	P / Oil	Moved to Corrosive room 1/3/88	
3/2/88	2 lbs		Bags w/ Lacer	Dye	4/11/88	
3/18/88	2 x 2 lbs		C / Organic metallics	D001	12/27/88	
3/22/88	1 sol can	1 lb	Red Phosphorus	D001	8/12/88	
3/23/88	2 x sol can	2 lbs	Oil w/ Tellurium	F003	4/11/88	
3/24/88	1 sol can	2 lbs	C / Acetic & MeOH	↓	4/11/88	
3/24/88	5 sol can	40 lbs	Positive Resist	↓	4/11/88	
3/30/88	1 gal +	1 qt	G.I	F002	4/11/88	
3/30/88	2 x 1 lb		Ceramic Adhesive	↓	4/11/88	
3/30/88	1 qt	2 lbs	Epoxy Resin	↓	4/11/88	
3/30/88	2 x 5 +	4 lbs	Thinner	D001	4/11/88	
3/30/88	2 x 5 +	4 lbs	Adhesive Cement	F002	4/11/88	
3/30/88	1 pt	1 lb	Release Agent	D001	8/11/88	
4/25/88		6 oz	Dowicide	X850		
5/20/88	2 lbs		C / As / P	D001	12/27/88	
7/12/88	100 ml	1 lb	DMF / FPA / Hg	D001	12/27/88	
7/18/88	100 ml	1 lb	Polyimide	D001	12/27/88	
7/21/88		25 gm	Dimethyl cadmium	D003	3/27/89	
7/21/88		100 gm	Trimethyl aluminum	↓	↓	
7/21/88		25 gm	Dimethyl zinc	↓	↓	
7/27/88		1 gm	Decacarbonyldirhenium	X940		
8/11/88		1/2 lb	Graphite / Cd / Te	D006		

CONTAINER STORAGE LOG

Date Stored	Container		Item	Waste Type	Date Removed	Doc. No.
	Vol.	Lbs.				
8/17/88		25 gm	Trifluoromethyl iodide	D002	3/21/89	
11/4/88	1 gal	2 lbs	As w/ red P	D004		
11/17/88		100 gm	Tetrafluoroethylene	D002	3/21/89	
12/5/88		1 lb	C / As / P	D001	3/6/89	
12/7/88	1 qt	2 lbs	Monochloroethane	D001	3/27/89	
1/3/89		1 gm	Ethanolamine		3/27/89	
1-9-89	3 oz		XYLENE		3/27/89	
1/17/89	1 BAG	1/4 lb	POSITIVE PHOTO RESIST		3/21/89	
"	1-5 gal	gal	DUPONT RESIST + MEROX STRIPPER		3/6/89	
3/9/89	1 GAL CAN		METHYLENE CHLORIDE		3/21/89	
3-16-89	2 GAL	16	RUBBER CEMENT	VISCUS	3/21/89	
3/16/89	1 qt		GLASS ADH/147		3/21/89	
11	3 oz.		CA 20		3/21/89	
3/22/89	288 cylinder	2 lbs	PHOSPHORUS TRIBROMIDE PBR3			
3/22/89	2 x 25 gm bottles		Trimethyl Indium Trimethyl Phosphate			
3/22/89	1 lb		C / As / P			
3/22/89	1 qt		UO. 0156		3/27/89	
3-24-89	4 qts	32	PHOTO RESIST	L1Q	3/27/89	
11	1/2 PT	4 oz	POLYIMIDE	L1Q	3/27/89	
3-28-89	1 GAL	8 LB	VIDEOTEC	L1Q		
3-28-89	5 GAL	10	PHOSPHOROUS TRIBROMIDE	SOL.		
3-28-89	2 x gal		Br2 + methanol			
3-28-89		2 lbs	Polyimide			
3-28-89	2 x 100 ml		Photoresist in Chlorobenzene			
3-28-89		1 lb	filter w/ oil			
3-28-89		2 lbs	filter w/ HF + P			
3-28-89	1 qt		Microresist			

CONTAINER STORAGE LOG

[illegible]

REFERENCE NO. 27

NOTICE OF VIOLATION

ID NO. NJD-11-25587 DATE 5-31-89
NAME OF FACILITY AT & T Bell Lab
LOCATION OF FACILITY Crawford Corner Rd. Holmdel, N.J. 07733
NAME OF OPERATOR Paul E. Wyszka, P.E. High Level Mgmt. Dept

You are hereby NOTIFIED that during my inspection of your facility on the above date, the following violation(s) of the Solid Waste Management Act, (N.J.S.A. 13:1E-1 et seq.) and Regulations (N.J.A.C. 7:26-1 et seq.) promulgated thereunder and/or the Spill Compensation and Control Act, (N.J.S.A. 58:10-23.11 et seq.) and Regulations (N.J.A.C. 7:1E-1 et seq.) promulgated thereunder were observed. These violation(s) have been recorded as part of the permanent enforcement history of your facility.

DESCRIPTION OF VIOLATION _____
N.J.A.C. 7:26-4.4(g) 5: No semiannual drills with
all employees and local authorities to test emergency
response capabilities.
N.J.A.C. 7:26-4.4(g) 8: Did not petition the Department
for an exemption to semiannual drills.
N.J.A.C. 7:26-4.4(g) 8.5: From the involvement of
local officials to the semiannual drills.

Remedial action to correct these violations must be initiated immediately and be completed by

May 1, 1989. Within fifteen (15) days of receipt of this Notice of Violation, you shall submit in writing, to the investigator issuing this notice at the above address, the corrective measures you have taken to attain compliance. The issuance of this document serves as notice to you that a violation has occurred and does not preclude the State of New Jersey, or any of its agencies from initiating further administrative or legal action, or from assessing penalties, with respect to this or other violations. Violations of these regulations are punishable by penalties of \$25,000 per violation.

Peter March

Investigator, Division of Waste Management
Department of Environmental Protection

Paul E. Wyszka, P.E. for
Paul E. Wyszka, P.E.

REFERENCE NO. 28



CN 028
Trenton, N.J. 08625-0028

(609)633-1408

State of New Jersey
DEPARTMENT OF ENVIRONMENTAL PROTECTION
DIVISION OF HAZARDOUS WASTE MANAGEMENT

Michele M. Putnam
Deputy Director
Hazardous Waste Operations

John J. Trela, Ph.D., Director

Lance R. Miller
Deputy Director
Responsible Party Remedial Action

H.L. Graham, Jr.
Executive Director, R&D
Facilities Management Division
AT&T Bell Laboratories
101 John F. Kennedy Parkway
Short Hills, NJ 07078-0905

APR 11 1989

Dear Mr. Graham:

RE: Facility Layout and Design Certification Approval for AT&T Bell Laboratories (Holmdel Site), Holmdel, Monmouth County, EPA ID No. NJD 011 328 887, N.J. Facility No. 1318G1

The Bureau of Hazardous Waste Engineering (the Bureau) is in receipt of your company's letter of July 19, 1989 signed by you and Paul E. Wyskowski, P.E., License No. 12307. This letter states that the facility layout and design of the hazardous waste storage areas is in compliance with the engineering plans and reports of Condition 1(a) of Section II as required by Condition 12(a)(1) of Section I of the hazardous waste facility permit issued by the Division on December 23, 1988.

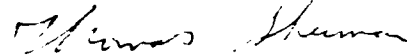
The Bureau has reviewed your certification submittal regarding layout and design of the subject facility. Also, the Bureau inspected the facility on March 31, 1989, and finds it in compliance with the layout and design set forth in the engineering plans and reports and permit Condition 12(a)(1) of Section I.

Therefore, please be advised that said submittal is acceptable and the subject facility is in compliance with the reporting requirements of the Hazardous Waste Facility Permit, Condition 12(a)(1) of Section I.

APR 11 1989

Should you have any questions, please contact Bob Patel of my staff at (609) 292-9880.

Very truly yours,



Thomas Sherman; Acting Chief
Bureau of Hazardous Waste Engineering

EP9/lm

cc: Barry Tornick, USEPA, Region II
Vince Krisak, BCE

DOCUMENT: ATTBELL2
FOLDER: LXMMCB

REFERENCE NO. 29

PRELIMINARY ASSESSMENT
OFF SITE RECONNAISSANCE
INFORMATION REPORTING FORM

Date: 9/26/89

Site Name: AT&T BELL LABS - HOLMDEL DD: 02-8909-14-PA

Site Address: CRAWFORDS CORNER ROAD
Street, Box, etc.

HOLMDEL
Town

MONMOUTH
County

NEW JERSEY
State

NUS Personnel:	Name	Discipline
	<u>D. COHEN</u>	<u>CHEM. ENG.</u>
	<u>J. FROST</u>	<u>BIOLOGIST</u>

Weather Conditions (clear, cloudy, rain, snow, etc.):

CLOUDY, COOL, CALM

Estimated wind direction and wind speed: 0 - CALM

Estimated temperature: 68°F

Signature: James S. Frost Date: 9/26/89

Countersigned: Robert S. W. Date: 9/26/89

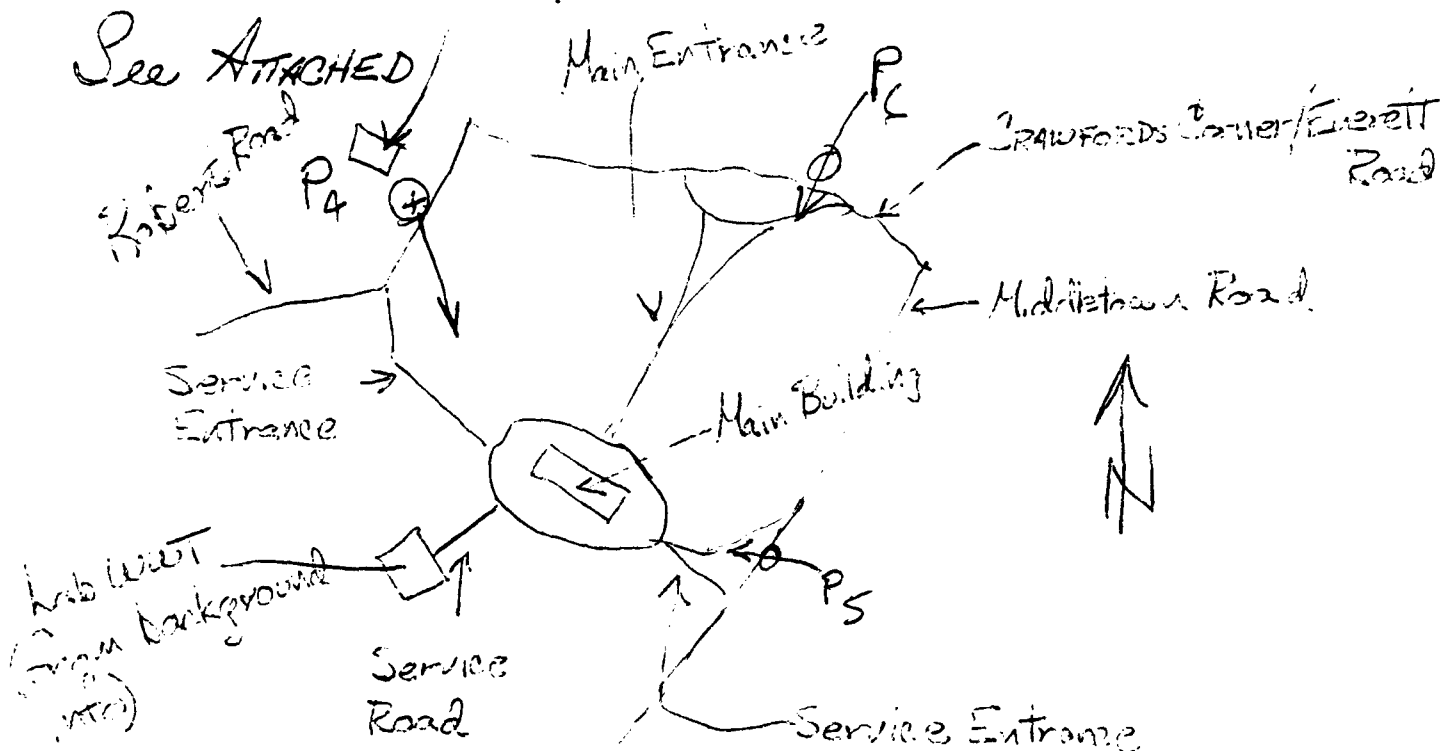
PRELIMINARY ASSESSMENT
INFORMATION REPORTING FORM

Date: 9/26/89

Site Name: AT&T BELL LABS - HOLMDEL IDD: 02-8909-14-PA

Site Sketch: Nursery

Indicate relative landmark locations (streets, buildings, streams, etc.).
Provide locations from which photos are taken.



Signature: James C. Frost

Date: 9/26/89

Countersigned: Neil S. [Signature]

Date: 9/26/89

Drum Storage Area

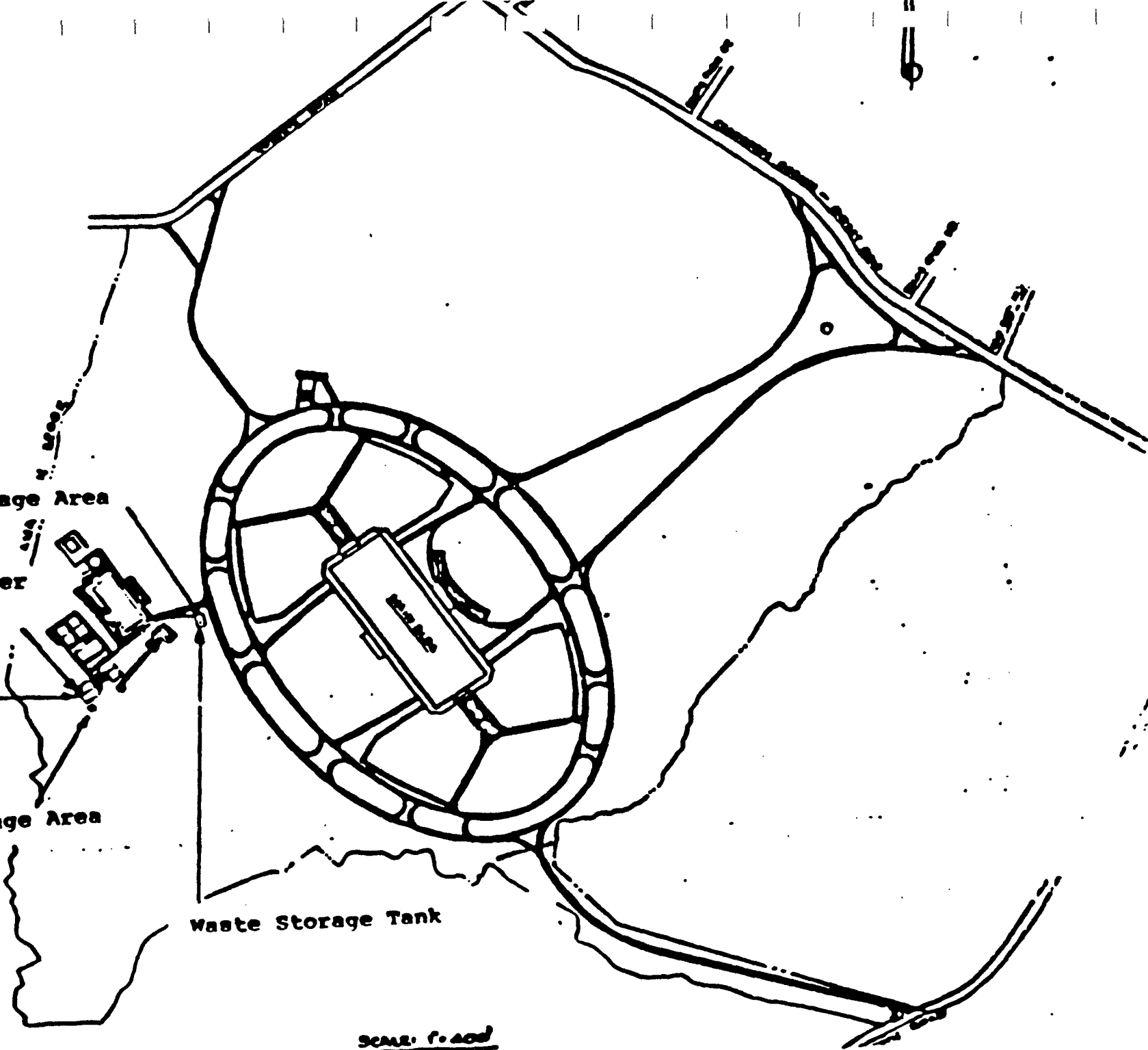
Waste Container
Storage Area

Island WASTE
TREATMENT PLANT

Waste Oil Storage Area

Waste Storage Tank

SCALE: 1" = 400'



PRELIMINARY ASSESSMENT
INFORMATION REPORTING FORMDate: 9/26/89Site Name: AT BELL LABS - HOLMDEL TDD: 02-8909-14-PA (D)

Notes (Periodically indicate time of entries in military time):

Arrived at site at 0958. No odors. Facility is so large nothing can be seen from road. Site is about 4 miles from road. Drove all the way around facility. Nothing unusual ~~to~~ could be seen. No drums tanks or other units were observed. At 1045 ~~to~~ 1015 drove to east end of swimming River Lake where New Jersey-American Water Company treatment plant was observed. Took picture of entrance sign. Plant's name is Swimming River Treatment Plant. No dead animals or stressed vegetation could be observed near site. The area is surrounded by generally low-density residential developments with small subdivisions interspersed. These homes are across the road from AT&T property. From what could be seen, the site appears to be flat with a slope of less than 2%. However,

Signature: James C. FrostDate: 9/26/89Countersignature: Belm J. J.Date: 9/26/89

PRELIMINARY ASSESSMENT
INFORMATION REPORTING FORM

Date: 9/26/89

Site Name: AT&T BELL LABS - HOLMDEN TDD: 02-8909-14 PA

Notes (Cont'd):

some small valleys due to creek beds were
noted in the surrounding area.

Attach additional sheets if necessary. Provide site name, TDD number, signature, and countersignature on each.

Signature: James C. Frost

Date: 9/26/89

Countersignature: ALSON

Date: 9/26/89

**PRELIMINARY ASSESSMENT
INFORMATION REPORTING FORM**

Date: 9/26/89

Site Name: AT&T BELL LABS - HOLMDEL TDD: 02-8909-14-PA

Photolog:

Frame/Photo
Number

Date

Time

Photographer

Description

<u>P4</u>	<u>9/26/89</u>	<u>9:58</u>	<u>J. FROST</u>	<u>LOOKING SSE TOWARD WEST-SIDE OF FACILITY.</u>
<u>P5</u>	<u>9/26/89</u>	<u>10:10</u>	<u>J. FROST</u>	<u>LOOKING W. AT EAST ENTRANCE OF FACILITY</u>
<u>P6</u>	<u>9/26/89</u>	<u>10:14</u>	<u>J. FROST</u>	<u>LOOKING SW AT MAIN ENTRANCE OF FACILITY</u>
<u>P7</u>	<u>9/26/89</u>	<u>10:35</u>	<u>J. FROST</u>	<u>ENTRANCE OF SWIMMING RIVER TREATMENT PLANT</u>

Attach additional sheets if necessary. Provide site name, TDD number, signature, and countersignature on each.

Signature: J. Frost

Date: 9/26/89

Countersignature: [Signature]

Date: 9/26/89

REFERENCE 30

Quaker-K. Christie
GMF

STATE OF NEW JERSEY
DEPARTMENT OF CONSERVATION
AND ECONOMIC DEVELOPMENT
DIVISION OF WATER POLICY
AND SUPPLY



WATER RESOURCES CIRCULAR 2

RECORDS OF WELLS AND GROUND-WATER QUALITY
IN MONMOUTH COUNTY, NEW JERSEY

Prepared in cooperation with
United States Department of the Interior
Geological Survey

1959

Table 1.--Age, thickness, and water-bearing properties of rock units in Monmouth County based chiefly on data from domestic wells

System	Series	Stratigraphic unit	Penetrated thickness (feet)	Water-bearing properties in Monmouth County
Quaternary	Recent	Alluvium, predominantly clay and sand.	0-10	Relatively nonwater bearing. No drilled wells reported in this material; many dug wells yield small supplies for domestic use.
	Pleistocene	Sand and gravel	0-60	Yields up to 6 gpm (gallons per minute) per well; many wells yield water containing iron. Larger yields probable, but none reported.
Tertiary	?	Cohansey sand	0-30	Not tapped by drilled wells, because of insufficient thickness; however, many dug wells tap this formation.
	Miocene	Kirkwood formation (sand and clay)	0-74	Yields range from 15 to 75 gpm; many well waters contain iron and hydrogen sulfide and have a low pH.
	Eocene	Manasquan and Shark River marls	0-100	Relatively nonwater bearing, but yields up to 12 gpm have been reported.
	Paleocene	Vincentown sand	0-155	Numerous domestic wells tap this sand. Reported yields range from 10 to 35 gpm; higher yields may be possible.
		Hornerstown marl	0-100	Relatively nonwater bearing. Yields of 5 gpm have been reported from a few wells.
Cretaceous	Upper Cretaceous	Red Bank sand (includes the Tinton sand member)	0-135	Yields range from 3 to 30 gpm; water contains iron.
		Navesink marl	0-45	Relatively nonwater bearing; a few wells have yielded as much as 10 gpm.
		Wenonah and Mount Laurel sands	0-85	Yields to 430 gpm have been reported; yields on the order of 300 gpm probably can be obtained locally from properly developed large-diameter wells.
		Marshalltown formation (clay and some sand)	0-50	Not considered water bearing.
		Englishtown sand	0-130	Average yield 15 gpm, and yields of 200 gpm might be expected from large-diameter wells.
		Woodbury clay	0-60	Not considered water bearing.
		Merchantville clay	0-60	do.
		Raritan and Magothy formations (alternating sand and clay layers)	175-580+	Yields of 600 gpm have been reported from these formations. The majority of wells are in the Raritan formation. The water from these formations is usually high in iron.
		Pre-Cretaceous rocks	?	Not tapped by wells.

Table 2.--Records of selected wells in Monmouth County, N. J.--Continued

No.	Location	Owner or name	Driller	Year completed	Altitude above sea level (feet)	Total depth (feet)	Diameter (inches)	Length of casing (feet)	Screen setting (feet)	Principal water - bearing bed		Static water level below land surface (feet)	Yield (gallons per minute)	Drawdown (feet)	Use of water	Remarks	No.
										Geologic age	Aquifer						
46	1.0 mi. SE. of Union Beach	Van Ameringen Haeblar, Inc.	Wm. Stothoff Co.	1951	10	328	6	298	298-328	Cretaceous	Raritan and Magothy formations	20	275	45	I	25- and 30-slot screens	46
47	1.3 mi. SW. of Keansburg	Wm. Brooks	S. Van Schoick	1952	20	106	4	101	101-106	do.	do.	18	4	22	D	Water contains iron.	47
48	.8 mi. E. of Matawan	John D. Codomo	Greenhalgh & Kaye	1953	75	258	4	253	253-258	do.	do.	35	30	10	D	See analysis, table 4.	48
49	1.2 mi. SE. of Keyport	Walter Ivans	S. Van Schoick	1952	40	115	4	107	107-115	do.	do.	40	5	20	D	Used only for lawn irrigation.	49
50	1.4 mi. SE. of Keyport	L. Bahrenburg	Tice Brothers	1952	100	31	4	27	27-31	do.	Englishtown sand	13	—	6	D	Not used for drinking.	50
51	1.7 mi. S. of Keansburg	Edward Leske	S. Van Schoick	1952	25	20	4	16	16-20	do.	do.	10	5	6	D	Water contains iron.	51
52	2.0 mi. NE. of Holmdel	Stanley Stillwell	Greenhalgh & Kaye	1954	110	72	4	68	68-72	do.	Wenonah and Mount Laurel sands	43	12	20	D	16-slot screen.	52
53	1.5 mi. N. of Holmdel	Mrs. Duncan	do.	1954	115	176	6	172	172-176	do.	Englishtown sand	75	20	23	D	See analysis, table 4.	53
54	1.9 mi. NE. of Holmdel	F & F Nurseries	Wm. Stothoff Co.	1954	110	200	6	190	190-200	do.	do.	60	60	90	I	do.	54
55	3.3 mi. NE. of Holmdel	Mr. A. C. Carlson	Greenhalgh & Kaye	1954	210	85	6	75	75-85	do.	Wenonah and Mount Laurel sands	64	8.3	19	D	25-slot screen.	55
56	2.3 mi. NE. of do.	John Waddington	do.	1955	190	49	4	49	45-49	do.	do.	16	10	14	D	18-slot screen.	56
57	2.5 mi. NE. of do.	Mr. A. Flomer	do.	1956	240	121	4	115	115-121	do.	do.	98	10	12	D	See analysis, table 4.	57
58	.5 mi. SW. of Atlantic Highlands	J. P. Julian	Tice Brothers	1951	20	36	6	26	26-36	do.	Englishtown sand	0	20	26	D	Flowing well	58
59	1.0 mi. SW. of do.	Charles B. Horster	Walter N. Cobb	1951	130	152	4	86	None	do.	do.	85	7.5	15	D	Water contains iron.	59
60	4.0 mi. NW. of Red Bank	Mr. L. Grandinetti	Greenhalgh & Kaye	1955	70	74	6	64	64-74	do.	do.	35	30	28	D	See analysis, table 4.	60
61	2.3 mi. NW. of Rumson	Joseph Stavela	R. Kaye	1951	165	248	6	248	240-245	do.	do.	178	12	11	D	Water contains iron.	61
62	1.0 mi. SW. of Robertsville	Mrs. A. Onorato	Greenhalgh & Kaye	1953	120	81	4	78	78-81	do.	do.	35	9	38	D	do.	62
63	.9 mi. E. of do.	John Lemli	do.	1954	180	100	4	96	96-100	do.	do.	70	10	20	D	do.	63
64	.7 mi. W. of Hilldale	Marlboro State Hosp	A. C. Schultes & Sons	1950	180	593	12	507	507-593	do.	Raritan and Magothy formations	138	636	35	P	do.	64
65	1.5 mi. NW. of Marlboro	H & L Farms	Wm. Stothoff Co.	1951	150	206	6	197	197-206	do.	Englishtown sand	62	55	85	I	do.	65
66	.7 mi. N. of Morganville	Joseph Stalgeitis	Andy White	1950	150	260	4	189	189-196	do.	Raritan and Magothy formations	120	12	—	D	See analysis, table 4.	66
67	.5 mi. N. of Marlboro	R. E. Morgan	R. Kaye	1947	170	175	6	160	160-170	do.	Englishtown sand	50	20	20	D	do.	67

Table 2.--Records of selected wells in Monmouth County, N. J.--Continued

No.	Location	Owner or name	Driller	Year completed	Altitude above sea level (feet)	Total depth (feet)	Diameter (inches)	Length of casing (feet)	Screen setting (feet)	Principal water - bearing bed		Static water level below land surface (feet)	Yield (gallons per minute)	Drawdown (feet)	Use of water	Remarks	No.
										Geologic age	Aquifer						
68	Marlboro	Henry Higgins	Greenhalgh & Kaye	1954	170	176	4	171	171-176	Cretaceous	Englishtown sand	73	12	27	D	Water contains iron.	66
69	Tennent	George Thompson	do.	1954	100	86	4	83	83-86	do.	do.	12	10	8	D	do.	69
70	.3 mi. S. of Tennent	Tennent Orchards, Inc.	do.	1954	130	167	6	157	157-167	do.	do.	35	12	70	D	See analysis, table 4.	70
71	1.5 mi. N. of Freehold	Arthur Weighell	John Leidel	1954	70	60	4	60	None	do.	Red Bank sand	35	10	7	D	Consumption, 300 gal- lons per day.	71
72	do.	Stanley Rodi	Greenhalgh & Kaye	1956	170	52	4	52	None	do.	do.	30	10	5	D		72
73	1.5 mi. NE. of Freehold	Frank Oumina	Tice Brothers	1953	190	324	6	304	304-324	do.	Englishtown sand	75	200	30	D	Supplies 5 families.	73
74	1.4 mi. SE. of Milledale	Mr. H. P. Nevad	Greenhalgh & Kaye	1953	115	164	4	101	101-104	do.	Wenonah and Mount Laurel sands	50	5	76	D		74
75	1.9 mi. N. of Holmdel	George Mabeny	do.	1954	250	228	6	223	223-228	do.	Englishtown sand	180	10	30	D	See analysis, table 4.	75
76	1.9 mi. N. of do.	Anthony Verange	Tice Brothers	1954	250	225	4	215	215-225	do.	do.	174	30	4	D	do.	76
77	1.4 mi. E. of do.	Laura Harding	Wm. Stethoff	1949	120	210	6	200	200-210	do.	do.	50	35	8	D	do.	77
78	1.6 mi. E. of Holmdel	Nick Petrusella	Andy White	1949	120	143	6	138	138-143	do.	do.	43	25	62	D	do.	78
79	1.0 mi. E. of Marlboro	George Wendel	do.	1949	120	80	4	80	None	do.	Wenonah and Mount Laurel sands	22	12	30	I	Water contains iron	79
80	2.5 mi. E. of Marlboro	Walter Voorhees	John Allen	1952	130	133	4	129	129-133	do.	Navesink marl	38	12	8	D	do.	80
81	2.4 mi. W. of Colts Neck	Leonard Pincus	John Allen	1954	160	99	4	95	95-99	do.	Red Bank sand	48	10	6	D	do.	81
82	2.0 mi. SW. of do.	Mr. Scatuorchio	Andy White	1950	110	250	6	238	249-250	do.	Englishtown sand	60	30	60	D	See analysis, table 4.	82
83	Colts Neck	Atlantic Township School	Greenhalgh & Kaye	1954	86	280	6	270	270-280	do.	do.	30	25	30	P	do.	83
84	2.8 mi. E. of Holmdel	Fred Gaskill	S. Van Schoick	1956	65	45	4	42	42-46	do.	Wenonah and Mount Laurel sands	10	7	20	D	20-slot screen.	84
85	1.6 mi. W. of Red Bank	Fred Snyder	Greenhalgh & Kaye	1953	100	92	4	?	None	do.	Navesink marl	30	10	12	D	25-slot screen.	85
86	.7 mi. S. of Red Bank	S. Van Schoick	S. Van Schoick	1954	30	30	4	23	23-27	do.	Red Bank sand	6	20	6	D	Consumption, 300 gal- lons per day.	86
87	2.0 mi. W. of Eatontown	James Durand	Walter N. Cobb	1951	70	68	4	49	None	do.	do.	20	10	5	D	Water contains iron.	87
88	2.0 mi. S. of Eatontown	Louis Venezia	Tice Brothers	1954	50	160	4	156	156-160	Tertiary	Vincentown sand	4	20	26	D	Temp., 54°F., pH, 8.0.	88
89	2.0 mi. NE. of Eatontown	Louis Grandetti	Greenhalgh & Kaye	1953	2	133	4	?	None	Cretaceous	Red Bank sand	2	12	61	D	Water contains iron.	89
90	1.2 mi. SW. of Monmouth Beach	Robert Hollywood	S. Van Schoick	1951	20	50	3	30	None	Tertiary	Hornerstown marl	4	5	24	D	Tested for 3 hours.	90

Table 3.--Logs of wells in Monmouth County, N. J.--Continued

Well 51, Phillips Mills; Edward Leske
(Log by S. Van Schoick)
Altitude, 25 feet

	Thickness (feet)	Depth (feet)
Cretaceous:		
Englishtown sand:		
Sand, yellow.....	10	10
Sand, brown.....	6	16
Sand, white.....	4	20

★ Well 52, Holmdel; Stanley Stillwell
(Log by Greenhalgh and Kaye)
Altitude, 140 feet

Quaternary:		
Pleistocene and Recent:		
Clay, yellow.....	18	18
Cretaceous:		
Navesink marl:		
Sand, clayey, black and gray.....	22	40
Sand, green, with shell fragments.....	10	50
Wenonah and Mount Laurel sands:		
Sand, fine.....	10	60
Sand, coarse.....	12	72

★ Well 53, Holmdel; W. J. Duncan
(Log by Greenhalgh and Kaye)
Altitude, 195 feet

Quaternary:		
Pleistocene:		
Sand, yellow, and clay.....	25	25
Cretaceous:		
Navesink marl:		
Marl, green, with shell fragments.....	20	45
Wenonah and Mount Laurel sands:		
Sand, and clay, black.....	40	85
Sand, fine, and clay.....	10	95
Sand, fine.....	10	105
Marshalltown formation:		
Clay, tough, black.....	30	135
Englishtown sand:		
Sand, fine, with lignite and stone.....	12	147
Clay, tough, black.....	13	160
Sand and clay.....	6	166
Sand, clean, with lignite and rock.....	10	176

Table 3.--Logs of wells in Monmouth County, N. J.--Continued

Well 75, Holmdel; George Hubeny
(Log by Greenhalgh and Kaye)
Altitude, 250 feet

	Thickness (feet)	Depth (feet)
Cretaceous:		
Red Bank sand:		
Sand, with yellow clay and "stone".....	58	58
Sand, and black clay.....	12	70
Sand, gray and black.....	25	95
Navesink marl:		
Marl, gray and black, with shell fragments.....	40	135
Wenonah and Mount Laurel sands:		
Sand, fine, with black clay.....	30	165
Sand, fine.....	25	190
Marshalltown formation:		
Clay, green and black.....	20	210
Englishtown sand:		
Sand, coarse, with lignite, black clay, and "stone".	18	228

★ Well 77, Holmdel; Laura Harding
(Log by Greenhalgh and Kaye)
Altitude, 120 feet

Cretaceous:		
Red Bank sand:		
Sand, and yellow clay.....	10	10
Navesink marl:		
Sand, fine, clayey, glauconitic.....	10	20
Clay, silty, gray, glauconitic, with shell fragments.	10	30
Wenonah and Mount Laurel sands:		
Sand, gray, slightly clayey, glauconitic.....	80	110
Marshalltown formation:		
Sand, very fine, clayey.....	20	130
Clay, gray, with some sand.....	10	140
Englishtown sand:		
Sand, gray, fine, with mica and clay lumps.....	50	190
Clay, gray, with sand.....	20	210

Table 3.--Logs of wells in Monmouth County, N. J.--Continued

☆ Well 78, Everett; Nick Petruzella
(Log by Andrew White)
Altitude, 130 feet

	Thickness (feet)	Depth (feet)
Cretaceous:		
Red Bank sand:		
Sand, black.....	35	35
Navesink marl:		
Clay, gray.....	20	55
Clay, black.....	8	63
Wenonah and Mount Laurel sands:		
Sand, glauconitic, with clay.....	45	108
Marshalltown formation:		
Clay, black.....	29	137
Englishtown sand:		
Sand, gray, with lignite.....	6	143

Well 81, Montrose; Leonard Pincus
(Log by John Allan)
Altitude, 160 feet

Red topsoil.....	4	4
Quaternary:		
Pleistocene:		
Gravel, red clay.....	12	16
Cretaceous:		
Red Bank sand:		
Sand, medium fine, mixed with clay.....	39	55
Clay, red.....	34	89
Sand, coarse, red.....	10	99

Table 3.--Logs of wells in Monmouth County, N. J.--Continued

Well 82, Freehold; Nicholas Scatourchio
(Log by Andrew White)
Altitude, 140 feet

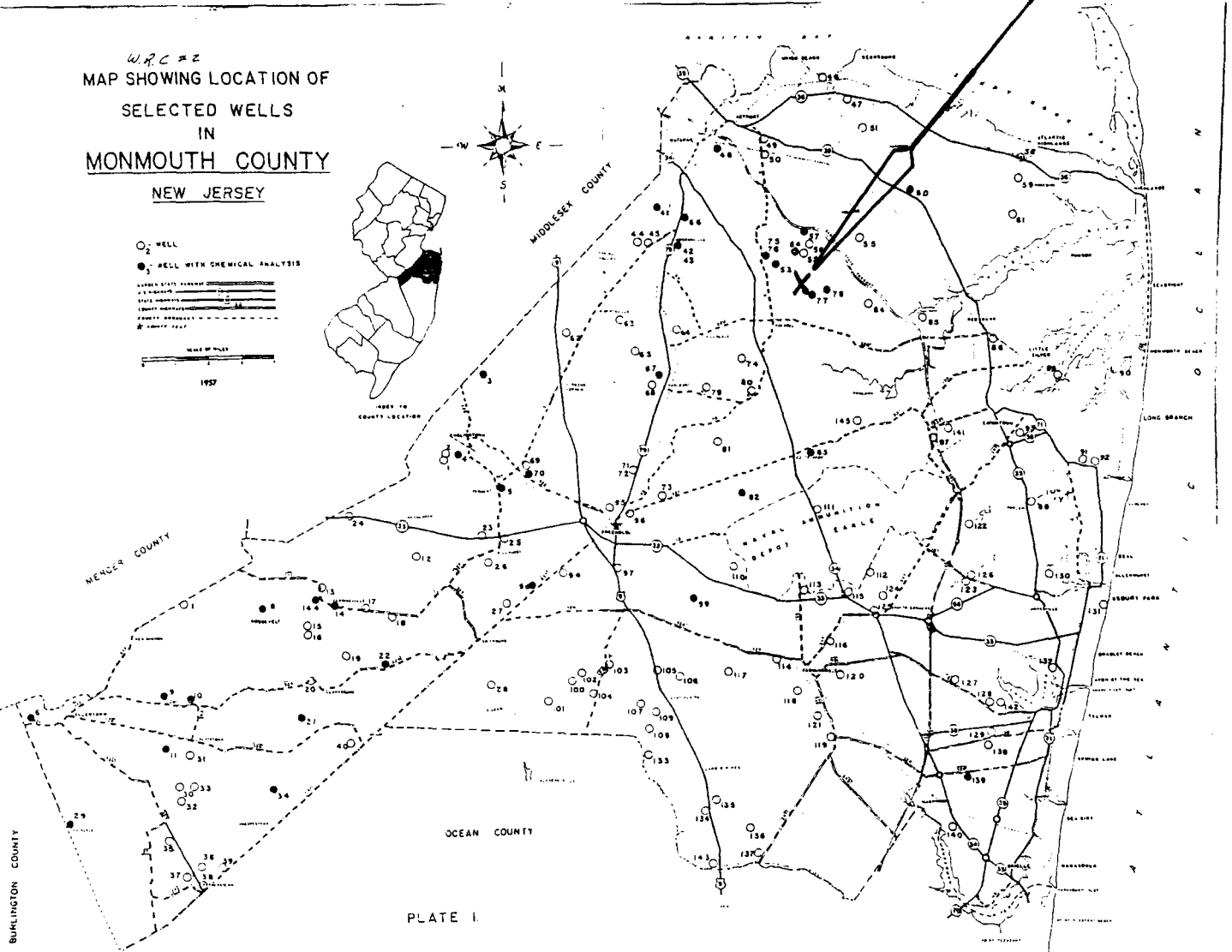
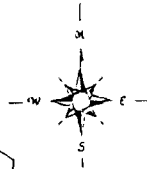
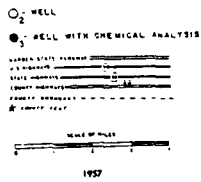
	Thickness (feet)	Depth (feet)
Quaternary(?):		
Clay, sandy, red.....	6	6
Tertiary:		
Kirkwood(?) formation:		
Sand, fine, yellow.....	24	30
Hornerstown marl:		
Sand, indurated, glauconitic.....	35	65
Cretaceous:		
Tinton sand member of Red Bank sand:		
Sand, indurated, glauconitic.....	20	85
Red Bank sand:		
Clay, sandy, black.....	20	105
Clay, black, with shell fragments.....	15	120
Navesink marl:		
Clay, sandy, black, with shell.....	20	140
Sand, black.....	5	145
Clay, black.....	15	160
Wenonah and Mount Laurel sands:		
Sand, fine.....	38	198
Marshalltown formation:		
Clay, black, and silt.....	37	235
Englishtown sand:		
Sand, gray, with lignite.....	15	250

Well 84, Everett; Fred Gaskill
(Log by Sidney Van Schoick)
Altitude, 65 feet

Cretaceous:		
Red Bank sand:		
Sand, red and yellow.....	18	18
Navesink marl:		
Sand, black.....	10	28
Sand, glauconitic.....	10	38
Wenonah and Mount Laurel sands:		
Sand, white.....	7	45

APPROXIMATE SITE LOCATION

WRC #2
MAP SHOWING LOCATION OF
SELECTED WELLS
IN
MONMOUTH COUNTY
NEW JERSEY



REFERENCE 31

REPRODUCED BY

EX-100

1975

GENERAL GEOLOGY

The Atlantic Coastal Plain physiographic province, of which Monmouth County is a part, is underlain by unconsolidated sediments of Mesozoic and Cenozoic age. For long periods of geologic time this coastal plain existed as a shallow shelf and received sediments from the eroding Appalachian Mountains. These eroding particles of silt, sand and clay were washed onto this shelf area, which then periodically subsided under the weight of the sediments. Consequently the shelf area closest to the then shoreline filled in and new sediment was carried down to the next subaqueous zone. In this manner a thick wedge of sediments was formed which now constitutes the coastal plain and continental shelf. The thickness of the coastal plain sequence in the County ranges from 500 feet in the northwestern part of the county to more than 1200 feet in the southeastern part. Offshore (on the outer continental shelf) these sediments increase in thickness to more than ten thousand feet.

The coastal plain sediments in Monmouth County are of marine and continental origin and are composed mainly of sands, silts and clays and greensands or glauconitic sands with interspaced gravel beds. Strata of iron-cemented sandstone are locally present. A thin veneer of sand, clay and gravel deposits of more recent age overlie the older coastal plain sediments. This layer is of Quaternary age (less than one million years old) and was deposited by outwash or meltwater from the glacial ice that covered all land as far south as northern New Jersey.






The eroded surfaces of the Mesozoic and Cenozoic coastal plain sequence are exposed at the surface in bands trending northeast-southwest. These bands can be seen on the geologic map of Monmouth County and represent cross-sections of strata dipping to the southeast at 15-60 feet per mile. See Figure 4.

Monmouth County has had a long and varied geological history. The oldest known rocks underlying the county were deposited in a shallow sea. These sediments, consolidated under great pressures and temperatures became sandstones and shales. Later these rocks were intruded by igneous rocks and altered to complex folded gneisses (pronounced nice's) and schists. These rocks are known as the Wissahickon Formation and are generally considered to be late Precambrian (about 600 million years) in age.







An extended period of nondeposition and erosion of the Wissahickon Formation then followed. Nondeposition and erosion occurs when a landform lies above sea level. Streams journey across a positive landform carrying away silt and sand to a negative (below sea level) landform. Approximately 120 million years ago during the Cretaceous epoch the Appalachian Mountains to the west were uplifted and streams flowing eastward deposited sediments along the coast. Another period of nondeposition and erosion occurred and some of the early Cretaceous sediments were removed. This cycle was repeated once again during the late Cretaceous period and was culminated with a complete withdrawal of the sea.

GEOLOGIC MAP OF MONMOUTH COUNTY NEW JERSEY

TERTIARY

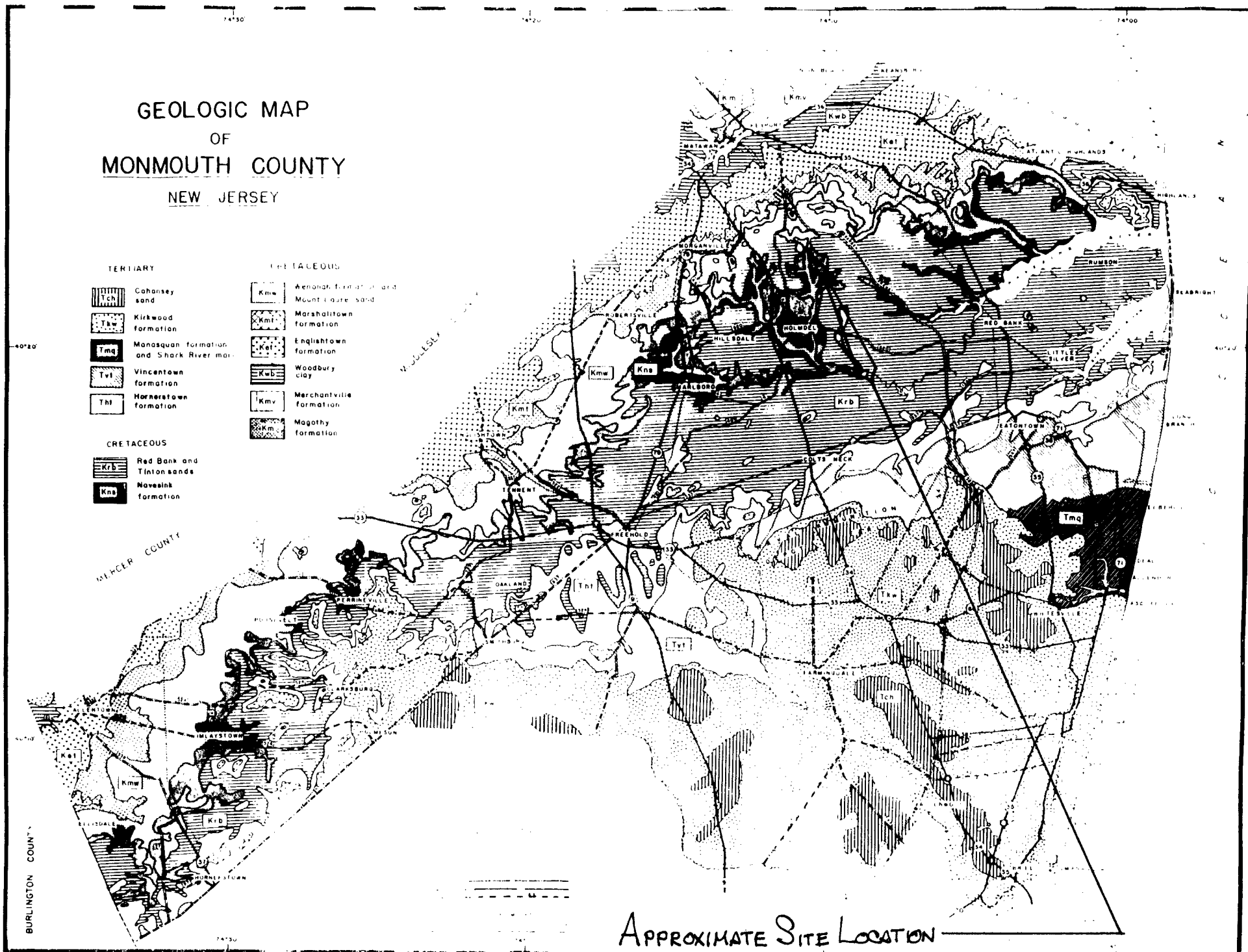
-  Cohasset sand
-  Kirkwood formation
-  Manasquan formation and Shark River marl
-  Vincentown formation
-  Hornerstown formation

CRETACEOUS

-  Kenilworth formation and Mount Laurel sand
-  Marlborough formation
-  Englishtown formation
-  Woodbury clay
-  Merchantville formation
-  Magothy formation

CRETACEOUS

-  Red Bank and Tinton sands
-  Navesink formation



APPROXIMATE SITE LOCATION

Some 60 million years ago the Tertiary Period began with a complete advance of the sea over Monmouth County. During the next 60 million years there were numerous transgressive and regressive (advances and retreats of the sea) cycles which alternately eroded, deposited and generally built up a sequence of sands, clays and gravels on top of the older Cretaceous rocks.

During the past one million years sediments that make up the Quaternary System were deposited. These sediments, which were carried down by melted waters from the glaciers to the north, belong to the Pleistocene Epoch or the "Ice Age". The Quaternary deposits since that time belong to the Recent Series. Recent deposits include stream and river alluvium and beach deposits such as those that make up Sea Bright and Sandy Hook.

STRATIGRAPHY

The Cretaceous and Tertiary sediments which make up the coastal plain sequence vary in thickness and many of the formations increase in thickness downdip. These sediments were deposited in cyclical transgressive and regressive patterns. In the Cretaceous Period, the Merchantville, Marshalltown, Mt. Laurel-Navesink and Tinton Formations are characterized by an abundance of glauconite and the presence of offshore type fossils. Formations containing glauconite (greensand) are usually considered to be offshore or deepwater deposits. The Magothy, Woodbury, Wenonah and Red Bank Formations are mainly nonglauconitic in composition and contain near shore or shallow water fossils. In the Tertiary sediments, the Hornerstown and Manasquan Formations are highly glauconitic and of deep-water origin. The Vincentown and Shark River sands and clays represent alternating retreats of the sea.

A more detailed description of the Geologic Formations of Monmouth County follows. Only formations that outcrop on the surface or have been identified in the subsurface are discussed and not the entire Coastal Plain sequence of the eastern seaboard. The description will start with the oldest formation in the county and end with the youngest undifferentiated sediments. A table showing the stratigraphic column in Monmouth County is shown in Figure 5. The duration of each geologic epoch is also shown in Figure 5. Sources for this discussion are: Dorf and Fox (1957); Jablonski (1967); and Richards (1967).

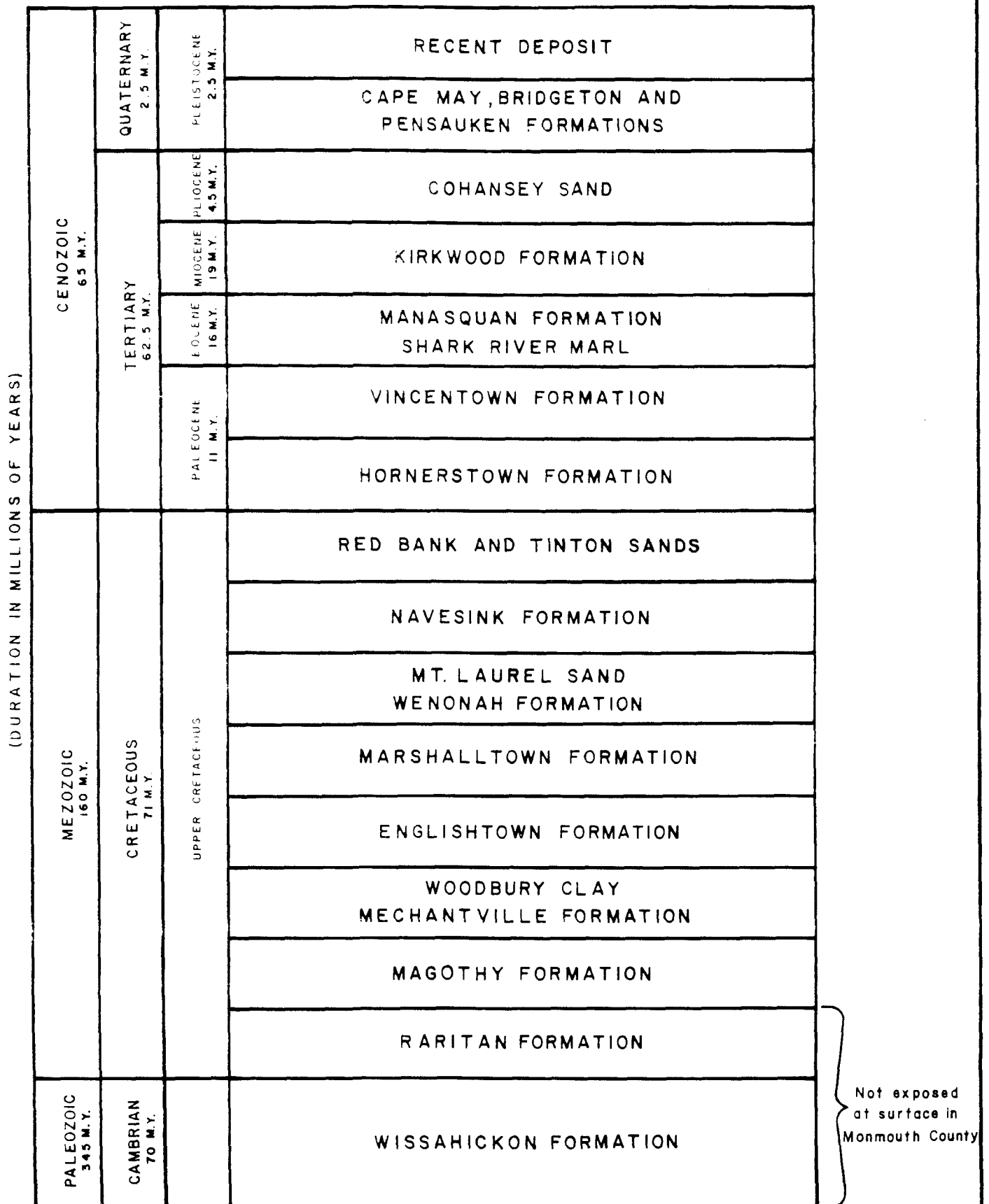
RARITAN FORMATION

The Raritan is the lowermost Coastal Plain formation in Monmouth County. It consists of alternating layers up to 300 feet thick at the outcrop in the Raritan Valley but thins and becomes less distinguishable Southwestward. In Monmouth County the Raritan ranges from 150 to more than 400 feet in thickness. It consists mainly of sands, clays and fireclays with local lignitic and carbonaceous material which darken the sediments. The Raritan is predominantly non-marine or brackish water in origin in the County but downdip marine fossils have been recovered from wells at depths of 1400 to 1550 feet.

GENERAL GEOLOGIC COLUMN

MONMOUTH COUNTY

(NOT TO SCALE)



MAGOTHY FORMATION

The Magothy Formation also consists of alternating beds of dark and light colored sand with considerable lignite. Near Cliffwood Beach the Formation contains marine fossils, but in other places it is nonmarine. Pyrite and marcasite concretions are common. The formation ranges in thickness from 25 to 175 feet.

MERCHANTVILLE CLAY

This clay is dark green or black in color and contains considerable glauconite. The Formation is over 50 feet thick in the County and is of marine origin.

WOODBURY CLAY

This formation consists of dark gray or black non-glauconitic and locally lignitic clay. There are also some interbedded lenses of white sand. The Woodbury is non-marine in origin and reaches 50-60 feet in thickness in Monmouth County.

ENGLISHTOWN FORMATION

The Englishtown Formation consists of white, yellow or gray micaceous quartz sand with some glauconite. It contains local cemented iron-oxide, lignite, pyrite and clay lenses. It ranges in thickness from 150 feet near Atlantic Highlands to less than 20 feet in Salem County. Fossils are scarce but the formation is thought to represent beach or shallow water nearshore deposits. Dorf and Fox (1957) suggest that the Englishtown may be non-marine in origin.

MARSHALLTOWN FORMATION

This formation varies from black sandy clay to a clayey green sand with much glauconite and chlorite. Small amounts of lignite is present. The formation is shallow water marine in origin and ranges from 30-50 feet in thickness.



WENONAH AND MOUNT LAUREL SANDS

The Mount Laurel Sand is a slightly glauconitic sand that grades downward into the Wenonah which is finer in texture and contains less glauconite. The two sands range in thickness from 15-85 feet. The Wenonah is marine in origin and contains local beds of sandy clay. The Mount Laurel is also of marine origin.

NAVESINK FORMATION

This Formation consists of semi-consolidated green sandy marl containing fine to coarse glauconite and quartz grains. The upper member is clayey and contains pyrite while the lower portion is coarser in texture and contains polished quartz pebbles and more glauconite than the upper part of the formation. The Navesink is marine in origin and ranges from 25-40 feet in the County.

RED BANK FORMATION

The Red Bank consists of a red to yellow-brown sand at the top underlain by a gray-brown sandy clay and clayey sand at the bottom. The basal 20 feet of sandy clay grades below into the Navesink. The Red Bank reaches a thickness of 140 feet in Monmouth County but thins southward and is not recognized in New Jersey south of Fort Dix. Only the lower clay member is fossiliferous and is of marine origin.

TINTON SANDSTONE

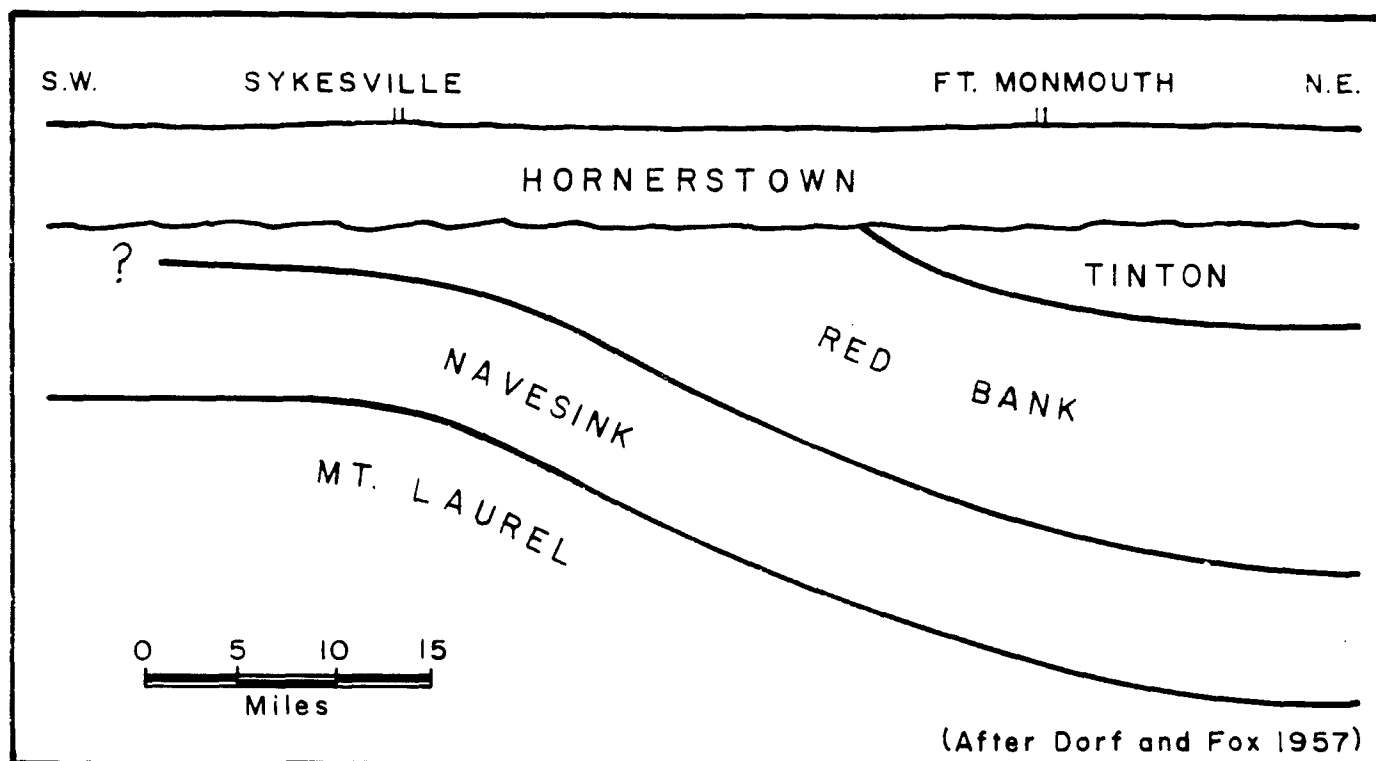
The Tinton is the youngest Cretaceous Formation in New Jersey. It is found only in Monmouth County where it attains a maximum thickness of 25 feet. It consists of a massive bed of indurated green sandy glauconite and contains poorly preserved marine fossils. At Beers Hill on the Hazlet-Holmdel Road there is an outcrop of the Tinton with abundant fossils; many of which have been replaced by vivianite, which is bright blue in color.

HORNERSTOWN FORMATION

The Hornerstown is a highly glauconitic sand with some clay present with a maximum thickness of about 30 feet in Monmouth County. From north to south it overlies first the Tinton, then the Red Bank and Navesink. This relationship in Monmouth County is shown on the next page. The formation is marine in origin and is locally highly fossiliferous.

VINCENTOWN FORMATION

This formation consists of two facies; a calcareous sand facies composed of animal remains such as bryozoans, corals and echinoids; and a quartz sand facies that is less fossiliferous and best developed in Monmouth County. The formation is marine in origin and ranges in thickness from 20 to 100 feet. The Vincentown is considered to be Paleocene (50-60 million years old) in age.



RELATIONSHIP BETWEEN HORNERSTOWN FORMATION AND
UNDERLYING CRETACEOUS FORMATIONS.

FIG. 6

MANASQUAN FORMATION

The Manasquan Formation consists of a greensand at the base which is about 15 feet thick overlain by about 10 feet of fine sand and greenish gray clay. The formation is marine in origin.

SHARK RIVER MARL

This marl is a mixture of 11 feet of glauconite and light colored sandy clay exposed along the banks of Shark River. It is fossiliferous and marine in origin. Richards (1967) states; pg. 2407, that it is impossible to separate the Shark River from the Manasquan Formation on the basis of lithology.

KIRKWOOD FORMATION

The Kirkwood consists chiefly of fine-grained micaceous sand with some clay present in occasional layers. The formation is composed of two members which are distinguished by their lithologic characteristics. The lower member is brown in color and is composed of sand with pebbles and some fine-grained glauconite. The upper member contains yellow sand with some lignite (Jablonski, 1967). The formation is 60-100 feet thick in Monmouth County, thickens considerably downdip. In Atlantic and Cape May Counties it reaches 600 feet in thickness. The formation is marine in origin and is Miocene (20 million years old) in age.

COHANSEY FORMATION

This formation, called the "water table aquifer" by Jablonski, (1967), is mainly a quartz sand that contains white, gray and red kaolinitic clays interbedded with the sands. The sand is also cross-stratified, contains pebbles and in places is cemented with iron oxide. The formation is upper Miocene in age and is as much as 30 feet thick in Monmouth County.

BEACON HILL GRAVEL

The Beacon Hill Gravel consists of 0 to 20 feet of quartz, chert, and quartzite pebbles which are products of stream deposition. This gravel is found mainly on the tops of the higher hills in Monmouth County. Dorf and Fox (1958) placed the Beacon Hill stratigraphically as the youngest Tertiary formation in New Jersey. Richards (1967) also places the Beacon Hill as upper Tertiary or Pliocene, but concedes that the formation may in reality be early Pleistocene.

BRIDGETON FORMATION

The Bridgeton is composed of sands reworked from the Kirkwood and Cohansey Formations and forms thin mantles on scattered hilltops in Monmouth County. The Bridgeton is early Pleistocene (one million years old) in age.

PENSAUKEN FORMATION

The Pensauken is similar to the Bridgeton but contains abundant ironstone fragments and some glauconite (Jablonski, 1967). It is Pleistocene in age.

CAPE MAY FORMATION

The Cape May is also composed of sediments derived from the reworking of older formations. The Cape May consists of two phases: (1) A marine phase found along the coast and (2) a fluvial phase with deposits occurring in stream valleys. The Cape May is Pleistocene in age and probably the youngest of the three Pleistocene Formations.

SOILS

The soils of Monmouth County are many and varied, ranging from fertile deep soils to droughty infertile soils with little humus or organic material present. In Monmouth County the Soil Conservation Service (SCS) recognizes 43 series of soil represented by 114 types or subtypes. Table 3 lists these soil series by SCS designation and series name. Also given is data on parent material (from which soil type is derived), natural drainage, soil depth and the color of the surface soil. More detailed information on soils and soil characteristics may be obtained at the Soil Conservation Service in Freehold. This information includes percentages of soils, drainage classes, erosion factors and many other soil characteristics.

For purposes of cultivation the SCS has divided all land into eight classes according to capability for production and treatments necessary for continued production. Class I soil is the most fertile and Class VIII is the least fertile soil. Classes I, II, III are those suitable for cultivation and Class IV is marginal but adaptable for certain crops. The remaining classes are suitable for pasture or woodland. Class VIII is only suitable for wildlife uses. Soil classes are shown in Table 5. Soil Classes I-III are shown on Figure 7.

SLOPE

A factor often related to soil compatibility is slope. If land is extremely flat water will tend to collect after a rain and not runoff. On the other hand steep slopes will raise the erosion potential of the land and limit its use. The SCS has divided slopes in Monmouth County into six classes. These slope classes are shown in Table 4. In Monmouth County 90 per cent of the land has less than a 10 per cent slope and 75 per cent has less than a 5 per cent slope. In general poorly drained soils have less than a 2 per cent slope and the Colts Neck, Lvesboro and Navesink soils tend to be in steeper areas. Steep slopes are shown on Figure 8.

TABLE 3
SCS SOIL SERIES IN MONMOUTH COUNTY

SCS SYMBOL	SERIES NAME	PARENT MATERIAL	NATURAL DRAINAGE	DEPTH	COLOR SURFACE SOIL
801	Hariton	Sand, glauconite	Good	Deep	Brown
802	Kresson	Sand, glauconite	Imperfect	Deep	Gray-brown
811	Monmouth	Sand, glauconite	Good	Deep	Yellow-brown
812	Danlonton	" "	Imperfect	"	Gray-brown
813	Colemantown	" "	Poor	"	Gray
814	Matlock	" "	Very poor	"	Black
821	Collington	" "	Good	"	Brown
822	Adelphia	" "	Imperfect	"	Gray-brown
823	(Shrewsbury)	" "	Poor	"	Gray
824	Keansburg	" "	Very poor	"	Black
841	Lincroft	" "	Excessive	"	Brown
861	(Freehold)	" "	Good	"	Yellow-Brown
862	(Holmdel)	" "	Imperfect	"	Gray-brown
871	Freehold (thick soil phase)	" "	Good	"	Yellow-brown
890	Colts Neck	" "	Good	"	Red-brown
8C1	(Freehold)	" "	Good	"	Yellow-brown
8C2	(Holmdel)	" "	Imperfect	"	Gray-brown
8J1	(Howell)	Silt on sand	Imperfect	Shallow	Gray-brown
930	(Ivesboro)	Brown sand	Excessive	Deep	Brown
931	Ivesboro	" "	"	"	"
932	(Kleij)	" "	Imperfect	"	Gray-brown
933	Plummer	" "	Poor	"	Gray
934	Rutledge	" "	Very Poor	"	Black
941	(Sassatras)	Sand-gravel	Good	"	Yellow-brown
942	Woodstown	" "	Imperfect	"	Yellow-Brown
943	(Fallsington)	" "	Poor	"	Gray
944	Pocomoke	" "	Very poor	"	Black
970	(Lakewood)	Gray sand	Excessive	"	Light gray
972	(Lakelurst)	" "	Imperfect	"	" "
973	Leon	" "	Poor	"	" "
974	(St. Johns)	" "	Very poor	"	Black
982	(Keyport)	Sand on clay	Imperfect	"	Gray-brown
983	(Elkton)	" "	Poor	"	Gray
984	Alloway	" "	Very poor	"	Black
9B1	(Matawan)	" "	Good	"	Light gray
9K0	Eatontown	Gray sand over green sand	Excessive	"	Light gray
9N1	Navesink	Sand gravel	Good	Shallow	Yellow-brown
9T1	Tuxedo	" "	"	"	" "
C01	(Tinton)	Sands w/glauconite	Excessive	Deep	Gray-brown
C02	Belano	Sands w/glauconite	Imperfect	Deep	Gray-brown
C23	Frenau	Glauconite (floodplain)	Imperfect	"	Brown
C24	Sanalapan	" "	Poor	"	Dark gray
C54	Johnson	Sand, silt and clay (floodplain)	Very poor	"	Black

TABLE 4

SLOPE CLASSES IN MONMOUTH COUNTY SOILS

A	0-2	Nearly flat slopes, little or no danger of erosion.
B	2-5	Slopes moderately subject to erosion under clean cultivation.
C	5-10	Under tillage, slopes greatly subject to erosion but controllable with suitable practices.
D	10-15	Slopes extremely subject to erosion under cultivation.
E	15-25	Slopes extremely subject to erosion under cultivation and not controllable under such use. Sod cover will protect soil.
F	25 +	Soils best protected by being kept in woodland.

*A one percent slope = a drop of 1 foot in 100 feet of horizontal distance.

ACID SOIL

Acid soil is found in many areas of Monmouth County and is considered to be a serious soil situation. The acidity is caused by a pyrite content. Upon exposure to air sulphuric acid (H_2SO_4) is formed, killing or adversely affecting fish and plant life. The construction depth of acid soil in Monmouth County is from 4-16 ft. with an extreme of 50 ft. which has been reported at Earle. An area in the northern section of the County where the acid formation is near the surface has resulted in many problems including the inability to establish grass or ornamental plantings and serious erosion.

Acid soil seems to be limited to the Woodbury, Englishtown, Wenonah, Marshalltown and Navesink Formations. The Monmouth County Planning Board and the Soil Conservation Service, Freehold District have maps showing locations where acid soil has been exposed in Monmouth County.

TABLE 3

LAND CLASSES IN MONMOUTH COUNTY

Class I	Very good land that is easily cultivated with ordinary liming, fertilizing, etc. Level, well-drained and easily worked.
Class II	Good land safely cultivated with easily applied practices. Some areas are droughty or may have imperfect drainage.
Class III	Moderately good land that can be cultivated with intensive practices. Lowland areas often require drainage. Upland areas subject to moderate to severe erosion.
Class IV	Fair land best suited to pasture and hay. Lowland areas require intensive drainage for successful cultivation.
Class V	Not recognized in Monmouth County.
Class VI	Suitable for grazing or forestry only.
Class VII	Useful for forestry only.
Class VIII	Land that is so steep, rough, sandy, wet, or severely eroded that it is best suited for wildlife.

WATERSHEDS AND STREAM FLOW

For many years the United States Geological Survey has been taking surface water measurements of selected streams in Monmouth County. The streams continuously monitored are Swimming River, Shark River and the Manasquan River.

There are eight major watersheds in Monmouth County. These are Swimming-Navesink River, Shark River, Manasquan River, Crosswicks Creek, Doctors Creek, Manalapan Brook, Millstone River and the North Branch of the Metedeconk River. These major drainage basins can be broken down into smaller units as several brooks may make up one river or large stream and each one has its own drainage area.



SWIMMING RIVER

The location of the water gage is 4.8 miles upstream from the river mouth and near the dam. The drainage area of this station is 48.5 square miles and records have been taken since August 1922. The gage measurements represent flow over dam spillway and through blowoff gates. The average discharge for the fifty-one year period ending 1973 was 78.4 cubic feet per second (cfs). The most recent data is that of 1973 and shows a range from 0.3 cfs to 2,740 cfs. The record discharge occurred on October 27, 1943 with a flow of 8,910 cfs.

SHARK RIVER BASIN

Near Neptune City

The water stage recorder is located on the left bank of the stream 100 feet upstream from bridge on Remson Mill Road and 1.7 miles from Neptune City. The drainage area of this gage is 9.96 square miles and the station has been in operation since October 1966. The average discharge over the first seven years (1966-1973) was 14.0 cfs. In 1973 the range of discharges was 1.1 cfs to 245 cfs. The record discharge was 580 cfs on December 26, 1969.

Jumping Brook

The water-stage recorder is located on the left bank of Jumping Brook 50 feet downstream from the dam on Jumping Brook Reservoir and 1.4 miles west of Neptune City. The drainage area is 6.43 square miles and the period of record is from October 1966. The average discharge from 1966 to 1972 was 10.4 cfs. For 1973 the range of discharges was from a minimum of 2.4 cfs to 499. The record discharge was 1830 cfs on September 12, 1971.

9. Mingamahone Brook at Squankum, N.J. (At bridge on N. J. Rt. 524).
10. Squankum Brook at Lower Squankum, N. J. (At bridge on N. J. Rt. 549).
11. Manasquan River at Allenwood, N. J. (At bridge on Hospital Rd.).

PONDS AND LAKES

Numerous small lakes and ponds are found in Monmouth County. These water bodies are natural and man-made. A number of ponds lie near the Atlantic Coast and are a product of naturally dammed streams. Such water bodies are Deal Lake, Lake Como, Wreck Pond and Stockton Lake. Many other streams were dammed to supply water to saw and grist mills in the 18th and 19th centuries. In addition the Soil Conservation Service (SCS) has over the years assisted construction of ponds and lakes on farms and industrial and research establishments. Some of these SCS assisted projects are for irrigation purposes while others are for fire protection and recirculation water for air-conditioners. The total number of ponds and lakes in the County now exceeds 800 or more than one per square mile on a county-wide basis.



RESERVOIRS

There are at present only two major reservoirs for public drinking water supply in Monmouth County. These two are Swimming River and Glendola Reservoirs. The first of these supplies has been developed on the Swimming River, a tributary of the Navesink River. It is located upstream of Swimming River Road and the original reservoir was constructed in 1901. In recent years it was enlarged to provide a capacity of 2.6 billion gallons. The drainage area at the reservoir is 48 square miles.

The second reservoir is in the Glendola area of Wall Township and is operated as an off-river storage facility to provide storage for flows pumped from Shark River and Jumping Brook. The Glendola reservoir has a capacity of 1.0 billion gallons (E. T. Killam Assoc., 1970). In addition land has been acquired for a reservoir system on the Manasquan River. The first phase of this project will provide 10 million gallons per day (MGD) and the ultimate potential is estimated at 35 (MGD).

GROUNDWATER

Groundwater includes that water which is at or below the level in the zone of saturation where all openings in the rock (interstices) are filled with water under atmospheric, or greater, pressure (Jablonski, 1967). In the unconsolidated sediments that underlie Monmouth County groundwater fills the pore spaces or interstices between the individual grains of sediment. The saturated or groundwater zone may be classified into three main categories. An aquifer is a saturated bed, formation, or group of formations which yields water in enough quantity to be a significant source of supply. An aquiclude is a saturated bed, formation, or group of formations which yields minor amounts of water and through which there is little movement of water. An

aquitard is a saturated bed, formation, or group of formations which yields minor quantities of water but through which appreciable vertical leakage of water is possible. This vertical leakage enables water to move into a more permeable aquifer (Walton, 1970).

Aquifers fall into two major types. These are water-table and artesian aquifers. Water-table or unconfined aquifers contain groundwater at the top of the saturated portion which is under atmospheric pressure. An artesian aquifer occurs where impermeable bed overlies and underlies an aquifer completely filled with water and under pressure. If water is pumped at a high rate from an artesian aquifer it may change to a watertable aquifer.

Ideally an aquifer serves as a transmission conduit and storage reservoir. The aquifer transports water from recharge areas to surface bodies of water, wetlands, springs and elsewhere. As a storage reservoir it provides reserve water for use during periods when withdrawals exceed recharge (Walton, 1970). In Monmouth County most of the groundwater withdrawn has been taken from artesian aquifers. According to Jablonski (1967) the aquifers in the County occur under water-table conditions only in their outcrop areas.

Although ground water is generally abundant in Monmouth County, heavy pumping of deeper aquifers may lead to salt water intrusion. As mentioned earlier the Magothy and Raritan Formations and the Englishtown Formation are the most important aquifers in Monmouth County. Other important aquifers are the Navesink Formation, the Red Bank and Tinton Sands, Vincentown Fm., Kirkwood Fm. and the Cape May, Bridgeton, and Pensauken Formations. The geological map Figure 4 shows the outcrop pattern of these aquifers.

GROUNDWATER RECHARGE

An aquifer may be recharged through vertical leakage or by precipitation on the intake or outcrop areas. Recharge direct from precipitation and or movement of surface water involves the vertical downward infiltration of groundwater through porous media. In humid areas (such as New Jersey) recharge from precipitation usually occurs during the spring months when evaporation is low and frequent rains prevail. During the summer and fall months evaporation is high and soil requirements are such that little precipitation seeps down to the water table. Recharge during winter months when the ground is frozen is negligible (Walton, 1970). For these reasons total annual precipitation is not as significant an indicator of annual aquifer recharge as is the precipitation that takes place during the non-growing season (Jablonski, 1967).

The amount of precipitation that enters the aquifer depends upon several factors. Among these are the thickness and nature of the soil, the topography, vegetal cover, soil moisture content, depth to the water table, the nature, intensity and distribution of rainfall and other precipitation and land use.

Deeply buried aquifers may be recharged, in part, by vertical leakage of water through unconsolidated deposits. This occurs primarily when the materials separating the aquifers are permeable. Most of the geologic

NAME	DESIGNATION	DESCRIPTION
★ Swimming River Reservoir	Scenic Wildlife Habitat Watershed-Flood-plain Water Supply Recreational	Contains meadows, swamps, and bogs. Used as water supply for Northeastern Monmouth County. Recreational potential.
14. Poricy Park	Scenic Wildlife Habitat	In addition to a fine recreational area the Park contains a unique and valuable fossil assemblage.
15. Pine Brook	Wildlife Habitat Watershed-Flood-plain	Well-developed floodplain surrounded by open forest. Mountain Laurel is plentiful. North of County Highway 537 is tide water.
16. Shadow Lake Marsh	Wildlife Habitat Watershed-Flood-plain	This freshwater marsh at the head of Shadow Lake contains the normal association of plants found in a healthy marsh.
17. Thimble Brook	Scenic Wildlife Habitat Watershed-Flood-plain	This tract of 290 acres contains a great variety of plant life including persimmon, wild azalea, princess pine (form of club moss) and a large number of mature black walnut trees.
18. Whale Pond Brook	Wildlife Habitat Watershed-Flood-plain	Half of the area consists of typical hardwoods and the other half of open fields.
19. Marsh	Wildlife Habitat Watershed-Flood-plain	Marsh contains numerous reptiles and amphibians as well as plants such as sphagnum moss.
20. Salt Water Marsh	Wildlife Habitat Coastal Flood-plain	Abundant <i>Spartina</i> present. Marsh affords a good view of the Shrewsbury River.
21. Parkers Creek	Wildlife Habitat Coastal Floodplain Recreational	A large variety of plants and animals present. Land ranges from a dry disturbed area to saltmarsh. Raccoon, fox, muskrat, ducks, pheasants and many other small animals populate the area.
22. Jim's Creek	Wildlife Habitat	Contains saltmarsh assemblage, including <i>Spartina</i> , <i>Distichlis</i> , etc. Turtles are very abundant also.
23. Clayton Tract	Scenic Recreational	Scenic overlook of Trenton and surrounding area.
24. Allentown Millpond	Scenic Wildlife Habitat Watershed-Flood-plain	A natural area with native populations of muskrats, raccoons, reptiles, frogs and birds. Presently a bird sanctuary.
25. Hemlock Grove	Wildlife Habitat	The tract consists of a mature hemlock grove on Miers Farm.
26. Doctor's Creek	Wildlife Habitat Watershed-Flood-plain	Tract contains a well-developed floodplain and marsh.

SUITABILITY BY PLANNING AREA

In 1967 the Monmouth County Planning Board adopted the planning area scheme to facilitate the planning process. Six such planning areas were developed and are shown in Figure 17. These planning areas are used in this report to discuss general county wide suitability. For the purposes of this report suitable means land that is lacking any significant natural feature such as wetlands, steep slopes or class I farm soils.

Some land may be more suitable than other land. A tract of land that is mostly wet or floodplain is less suitable for building than well drained land with a forest cover. Likewise land devoid of any significant natural feature may have a high value in an open state if it is the last undeveloped tract in a municipality with little or no parkland.

The following evaluations are based on the Monmouth County Development Suitability map completed in April, 1974. This map can be found in the inside back cover of this report. As can be seen from this map lighter areas are more suitable for development than darker areas. Some natural areas were not included on the map because of insufficient data or oversight. These areas include wetlands along the Navesink and Shrewsbury Rivers in Planning Areas I and II and ocean beaches in Planning Areas II, III and IV.

It should be stressed here that this section is only meant to be a general guide and that local towns should prepare detailed natural features studies of their own. This study will serve as a county overview and as an indicator of regional impacts.

★ Planning Area I

Matawan Creek	Many Mind Creek
Gravelly Brook	Clay Pit Creek
Luppataong Creek	McClees Creek
Chingarora Creek	Poricy Brook
Flat Creek	Nut Swamp Brook
Thornes Creek	Hop Brook
Waylake Creek	Willow Brook
Mahoras Brook	Swimming River
Pews Creek	Navesink River
Comptons Creek	

Planning Area II

Pine Brook	Branchport Creek
Little Silver Creek	Whale Pond Brook
Parkers Creek	Navesink River
Oceanport Creek	Shrewsbury River
Turtle Mill Brook	

TABLE 10 The Natural Streams of the Planning Areas

PLANNING AREA I

Planning Area I comprises all the bayshore areas of the County, including Middletown Township, Atlantic Highlands, Highlands, Keansburg, Union Beach, Hazlet Township, Keyport, Matawan and Matawan and Holmdel Townships (see Figure 17).

This planning area is the second largest in the county and contained 30.2 percent of the total county population in 1974. This percentage is based on a Monmouth County Planning Board estimate of the January 1, 1974 county population.

Although this region is intensely developed along the Bayshore lowland and in Central Middletown, several large areas are still suitable for development. Such areas include lands along Highway #35 and Middle Road in Middletown and acreage along Navesink River Road in Middletown. In the long term, Planned Residential Developments (PRD's) could be considered for these lands along Navesink River Road. Such development can be sited in a natural setting with minimal effect on topography and natural drainage.

Sensitive Areas

The environmentally sensitive areas in Planning Area I are:

1. Drainage Basin and Steep Slope areas in Holmdel and Middletown which are part of the Swimming River Basin.
2. All stream flood plains.
3. Fresh and salt-water marshes especially in Union Beach, Keyport, Matawan, Belford, Port Monmouth, Atlantic Highlands and Clay Pit and McClees Creeks in Middletown.
4. Steep slope areas in the Navesink Highlands in Atlantic Highlands, Highlands and Middletown. These slopes have had a documented history of geologic instability dating back to 1790.

Recommendations

As Planning Area I becomes more intensively developed and redeveloped, its open space and other recreational needs will greatly increase. Some of these needs will be met by Municipal, County, State and Federal Parks and recreation areas. The Wetlands Act of 1970 will further protect most of the remaining coastal marshlands. To round out these open space and recreational needs the following recommendations are made:

1. Establish a system of linear greenbelts along primary and secondary waterways with links to Municipal and County Parks. Such greenbelts would both protect and preserve stream flood

plains and stream valleys, aid in groundwater and aquifer recharge and provide both passive and active recreational uses. Such a system has already been adopted by Monmouth County in the Open Space Plan.

2. Institute cluster, PUD and PRD zoning with strict maximum coverage standards.
3. Adopt soil erosion and sedimentation ordinances, tree removal and soil removal ordinances as well as property maintenance ordinances to protect the existing environment.
4. Protect existing lowlying areas along the Bayshore with coastal flood projects and limit further building within the coastal flood zone as defined by historic flood levels. In some cases it may be more economical to purchase flood prone buildings rather than resort to expensive flood control projects.
5. Establish protective measures for those areas listed as unique natural areas.

PLANNING AREA II

Planning Area II consists of Long Branch City, Shrewsbury Township and the Boroughs of Eatontown, Fair Haven, Little Silver, Monmouth Beach, New Shrewsbury (northern part), Oceanport, Red Bank, Rumson, Sea Bright, Shrewsbury and West Long Branch (see Figure 17). Based on the 1974 County population estimate Planning Area II contained 22.4 percent of the total County population in 1974.

This Planning Area is very intensely developed especially along the Atlantic Coastal Region and in the Red Bank-Fair Haven-Little Silver sector. The main areas suitable for development are in New Shrewsbury and Eatontown. In New Shrewsbury the area west of the Garden State Parkway is mostly suitable to highly suitable. In Eatontown the areas between Wyckoff Road, Wall Street and the Poplar Brook Flood Plain is also highly suitable for development. This area is estimated to be around 400 acres.

Sensitive Areas

There are many environmentally sensitive areas in Planning Area II which can and should be reserved for public open space areas. These areas include the following:

1. All ocean beaches.
2. White area in Fair Haven at corner of Fair Haven and Ridge roads now Green Acres lands (77 acres).

APPENDIX I

A Partial List of Trees and Shrubs From Monmouth County (Source: Monmouth County Parks System)

TREES

White Ash	Green Ash
Big-Toothed Aspen	Quaking Aspen
Atlantic White Cedar	Basswood
American Beech	Black Birch
Gray Birch	Black Gum
Box Elder	Black Cherry
American Chestnut	Flowering Dogwood
Eastern Red-Cedar	American Elm
Eastern Hemlock	Pignut Hickory
Shagbark Hickory	American Holly
Ironwood	Black Locust
Honey Locust	Norway Maple
Red Maple	Silver Maple
Red Mulberry	White Mulberry
Black Oak	Swamp White Oak
Chestnut Oak	White Oak
Pin Oak	Willow Oak
Pitch Pine	Red Pine
White Pine	Sassafras
Black Spruce	Norway Spruce
Tree-of-Heaven	Water Tupelo
Black Walnut	Black Willow
Crack Willow	Weeping Willow

SHRUBS

Pink Azalia
Wild Azalia
Blackberry
Blueberry
Choke Cherry
Coralberry
Red Osier Dogwood
Common Elderberry
Hawthorn
Inkberry
Sweet Pepperbush
Shadbush
Staghorn Sumac
Winged Sumac
Winterberry

Swamp Azalia
Southern Bayberry
Blackhaw
Common Buttonbush
Sand Cherry
Large Cranberry
Swamp Dogwood
Fetter-bush
Huckleberry
Mountain Laurel
Raspberry
Spicebush
Poison Sumac
Arrow-wood Viburnum
Witch-hazel

APPENDIX II

Mammals and Reptiles Found in Monmouth County (Source: Monmouth County Parks System)

MAMMALS

Opossum	Gray Fox
Smokey Shrew	Woodchuck
Least Shrew	Eastern Chipmunk
Short-tail Shrew	Eastern Gray Squirrel
Starnose Mole	Red Squirrel
Eastern Mole	Southern Flying Squirrel
Keen's Myotis (bat)	Beaver
Little Brown Myotis	White-footed Mouse
Small-footed Myotis	House Mouse
Silver-haired Bat	Norway Rat
Eastern Pipistrel	Southern Bog Lemming
Red Bat	Boreal Redback Vole
Big Brown Bat	Meadow Vole
Hoary Bat	Pine Vole
Raccoon	Muskrat
Longtail Weasel	Meadow Jumping Mouse
Mink	Eastern Cottontail Rabbit
River Otter	New England Cottontail
Striped Skunk	Virginia Whitetailed Deer
Red Fox	European Hare

REPTILES

Lizards

Northern Fence

5-Lined Skink

Turtles

Common Snapping

Wood Turtle

Musk Turtle

Diamond-Backed Terrapin

Eastern Box

Bog Turtle

Spotted Turtle

Eastern Mud

Eastern Painted

Red-Earred

Snakes

Eastern Smooth Earth

Northern Brown

Eastern Garter

Eastern Hognose

Northern Ringneck

Northern Black Racer

Black Rat

Scarlet

Eastern King

Red-bellied

Northern Water

Eastern Ribbon

Eastern Worm

Rough Green

Northern Pine

Corn

Eastern Milk

Timber Rattler

AMPHIBIANS

Toads

Eastern Spadefoot

Fowlers

Tree Frogs

Spring Peeper

Pine Barrens

Gray

New Jersey Chorus

True Frogs

Cricket

Pickereel

Northern Leopard

Bull

Carpenter

Green

Wood

REFERENCE 32

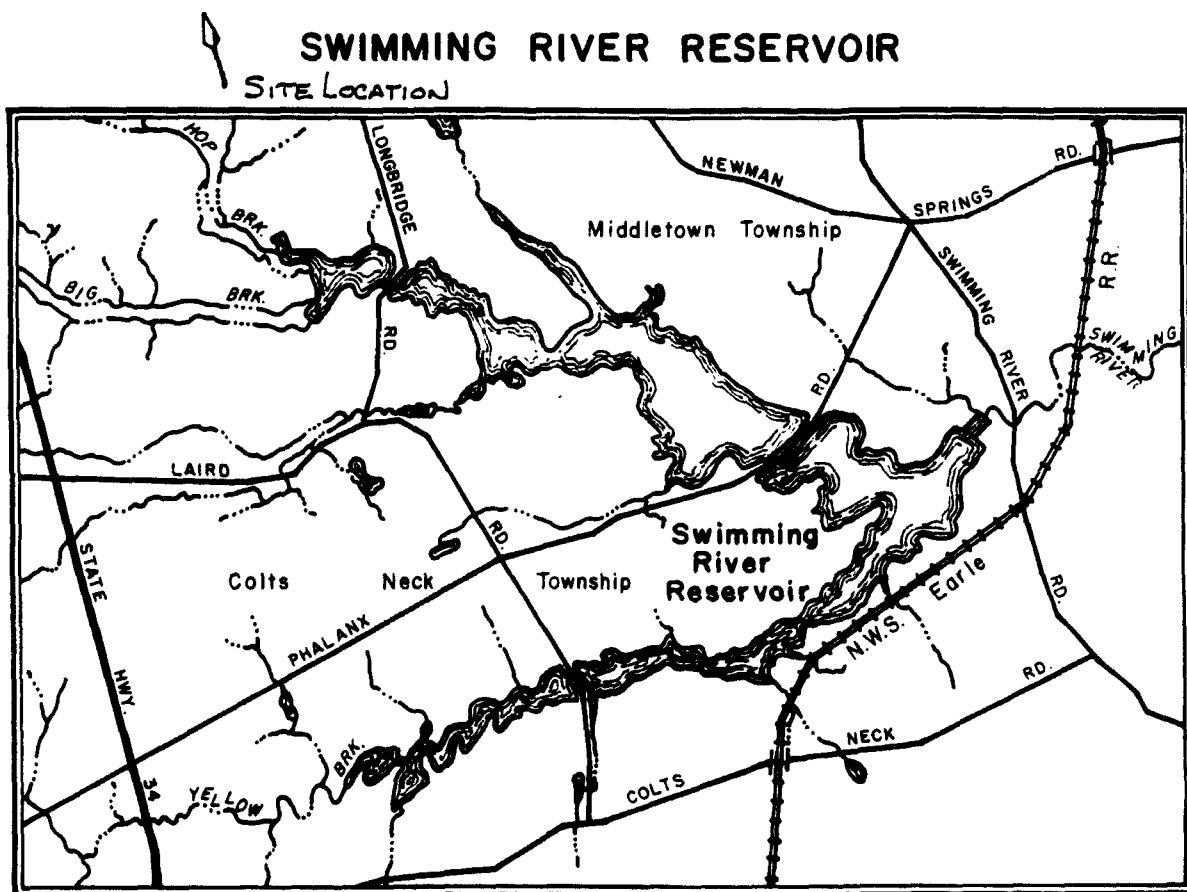
Monmouth County

UNIQUE AREAS STUDY



Prepared by the
Monmouth County Environmental Council

December, 1978



LOCATION

The Swimming River Reservoir lies between Normandy and Willow Brook Roads, and Brookdale Community College and Laird Road in Colts Neck Township.

DESIGNATION

1. Wildlife Habitat
2. Recreational - Swimming, canoeing, fishing, etc.
3. Watershed/Floodplain
4. Water Supply
5. Scenic

ECOSYSTEM DESCRIPTION

COMMUNITY: This area supports a beech-maple community with a number of tulip trees and locusts. The area seems to be in a mature successional state, with the vegetation perpetuating itself (i.e.

the saplings are the same species as the mature trees). The soil is mesic and consists mostly of highly permeable deep sands. The southwestern end, however, consists of high swelling potential clays with a nearly impermeable subhorizon and poor drainage.

VEGETATION: In addition to the abundance of beech, maple, locust, tulip trees and in some areas oak, other species include sassafras, ironwood, sycamore and ash, with sumac, blackberry and inkberry growing near the water. Marsh grasses, Phragmites and rushes are predominant in the marshy southwestern end.

ORGANISMS: Common forest mammals are present throughout the area along with a large population of song-birds and waterfowl. Amphibians and reptiles are common there and include watersnakes, turtles, frogs and salamanders. Large trout and other fish provide good sport for fishermen.

DISCUSSION: Swimming River Reservoir, besides being a major water supply for the County, offers much in recreational services. There is an abundance of fish and the reservoir is large enough for boating. At present it is privately owned, but in the future the County Parks System may be allowed to utilize the lake for public use. Three areas would be designated as entry points, with the main entry Thompson Park in Lincroft. Two others would be located on Phalanx and Long Bridge Roads. The major problem in the plan would be to have sufficient personnel present for safety purposes.

REFERENCE 33

ERP No. D-MMS-A02224-00, Rating EO2, 1989 Central and Western Planning Areas Gulf of Mexico Outer Continental Shelf (OCS) Oil and Gas Sales No. 118 and 122, Lease Offerings offshore the coast of Alabama, Mississippi, Louisiana and Texas.

Summary

EPA expressed objections to the proposed action of unrestricted leasing in the Central and Western Gulf. EPA also expressed concern over the lack of any proposed mitigation for possible impacts to deep-water benthic communities. EPA also expressed concern that ozone modeling of the effect of offshore emission on onshore air quality be conducted.

ERP No. D-NPS-K61095-NV, Rating LO, Death Valley National Monument, General Management Plan, Implementation, Inyo and San Bernardino Counties, CA and Nye and Esmeralda Counties, NV.

Summary

EPA expressed a lack of objections to the proposed management plan but noted that future multiple use activities (mining, campgrounds) will require an assessment of air quality, surface water and ground water impacts.

Final EISs

ERP No. F-COE-H30000-1A, Des Moines Recreational River and Greenbelt Area, Development, Operation and Maintenance, Des Moines River, Webster, Hamilton, Boone, Dallas, Polk, and Warren Counties, IA.

Summary

EPA has no objections to this project with the understanding that each unit of the project will be evaluated separately for NEPA compliance at a later date.

ERP No. F-FHW-F40290-WL, WI-TT-83 Improvement, I-94 to Cardinal Lane/WI-TT-16, Funding and 404 Permit, Waukesha County, WI.

Summary

EPA has no objection to this project, long as a minimum of 0.8 acre of additional wetlands are created.

(Note: The above summary should have appeared in the 6-10-88 Federal Register Notice.)

ERP No. F-USN-C85041-NJ, Colts Neck, Naval Weapons Station Earle Family Housing Development, Construction, Mammouth County, NJ.

Summary

EPA's concern regarding the location of the mitigation site has been addressed in this document. In addition,

information within the document clarified our questions with respect to the delineation of wetlands, and the point of discharge of the wastewater treatment plant. Accordingly, EPA has no unresolved concerns regarding the implementation of the project as proposed.

ERP No. F-USN-D84005-VA, Empress II Operation, Electromagnetic Pulse, Radiation Environment Simulator for Ships, Chesapeake Bay (West of Bloodsworth Island) and Atlantic Ocean (Virginia Capes Operating Area), off the Coast of VA.

Summary

EPA expressed a preference for the proposed site and requested a thorough monitoring program for the project.

(Note: The above summary should have appeared in the 6-17-88 Federal Register Notice.)

Dated: June 21, 1988.

William D. Dickerson,

Deputy Director, Office of Federal Activities.

(FR Doc. 88-14353 Filed 6-23-88; 8:45 am)

BILLING CODE 5500-50-01

(ER-FRL-3404-3)

Environmental Impact Statements; Availability; Weekly Receipts

Responsible Agency: Office of Federal Activities, General Information (202) 382-5073 or (202) 382-5073. Availability of Environmental Impact Statements, Filed June 13, 1988 Through June 17, 1988, Pursuant to 40 CFR 1506.9.

EIS No. 880189, Draft, BLM, AZ, San Pedro River Riparian Resource Management Plan, Implementation, San Simon Resource Area, Safford District, Cochise County, AZ, Due: September 21, 1988, Contact: Jerrold Coolidge (602) 428-4040.

EIS No. 880190, Draft, DOE, ND, Charlie Creek-Belfield 345 kV Transmission Line Project, Construction, Operation and Maintenance, Implementation, Billings, Stark, McKenzie and Dunn Counties, ND, Due: August 8, 1988, Contact: James D. Davis (406) 657-5523.

EIS No. 880191, Draft, SCS, MD, East Yellow Creek Watershed, Soil Erosion and Flood Damage Reduction Plan, Funding and Implementation, Sullivan, Linn and Chariton Counties, MO, Due: August 8, 1988, Contact: Russell C. Mills (314) 878-3214.

EIS No. 880192, Draft, NPS, AK, Denali National Park and Preserve, Wilderness Recommendations, Designation or Nondesignation, AK, Due: August 29, 1988, Contact: Linda Nebel (907) 257-2854.

EIS No. 880193, Draft, AFS, WY, Little Bighorn River, Wild and Scenic River Study, National Wild and Scenic Rivers System, Designation, Bighorn National Forest, Sheridan County, WY, Due: September 22, 1988, Contact: Arthur Bauer (307) 672-6781.

EIS No. 880194, Draft, USN, PA, U.S. Navy Girard Point Site, Sale to the Philadelphia Municipal Authority for the Establishment of a Steam Generation Facility that Produces Steam for Purchase by the U.S. Navy, City of Philadelphia, PA, Due: August 12, 1988, Contact: Kenneth Petrone (215) 687-6431.

EIS No. 880195, Final, FHW, PA, PA-23/New Holland Avenue/LR-1124, Section B01 Relocation, US 30 to Walnut and Chestnut Streets, Funding and 404 Permit, Manheim, East Lampeter and Lancaster Townships and the City of Lancaster, Lancaster County, PA, Due: July 23, 1988, Contact: Philibert A. Quillet (717) 782-4422.

EIS No. 880196, Draft, FRC, REG, Regulations Governing Independent Power Producers (RM88-4-000) and Regulations Governing Bidding Programs (RM88-5-000), Implementation, Due: August 15, 1988, Contact: Glida Rodriguez (202) 357-9155.

EIS No. 880197, Draft, SCS, MS, Whites Creek, Watershed Protection and Flood Prevention Plan, Funding, Possible 404 Permit and Implementation, Webster County, MS, Due: August 8, 1988, Contact: L. Peter Heard (601) 965-8206.

EIS No. 880198, Draft, EPA, FL, CP Mining Complex II, Open Pit Phosphate Mine and Beneficiation Plant, Construction and Operation, NPDES and 404 Permits, Hardee County, FL, Due: August 8, 1988, Contact: Maryann Gerber (404) 347-3776.

Dated: June 21, 1988.

William D. Dickerson,

Deputy Director, Office of Federal Activities.

(FR Doc. 88-14352 Filed 6-23-88; 8:45 am)

BILLING CODE 5500-50-01

(FRL-3340-F)

AGENCY: U.S. Environmental Protection Agency.

ACTION: Notice.

SUMMARY: Notice is hereby given that, pursuant to section 1424(e) of the Safe Drinking Water Act, the Administrator of the U.S. Environmental Protection Agency (EPA) has determined that the

New Jersey Coastal Plain Aquifer System. underlying the New Jersey Coastal Plain Area, is the sole or principal source of drinking water for the Counties of Monmouth, Burlington, Ocean, Camden, Gloucester, Atlantic, Salem, Cumberland, Cape May and portions of Mercer and Middlesex Counties, New Jersey, and that the aquifer, if contaminated, would create a significant hazard to public health. As a result of this action EPA will review. Federally-assisted projects (projects which receive Federal financial assistance through a grant, contract, loan guarantee, or otherwise) proposed for construction in a project review area which includes the New Jersey Coastal Plain Area and a portion of the aquifer streamflow source zone. The streamflow source zone includes upstream portions of the Delaware River Basin in the States of Delaware, New Jersey, New York and Pennsylvania. Federally-assisted projects will be reviewed to ensure that they are designed and constructed so that they do not create a significant hazard to public health. Projects outside of the project review area but within the streamflow source zone will be reviewed if they require an Environmental Impact Statement (EIS). **DATES:** This determination shall be promulgated for purposes of judicial review at 1:00 P.M. Eastern Time on July 7, 1988. This determination shall become effective on August 8, 1988.

ADDRESSES: The data on which these findings are based, detailed maps of the New Jersey Coastal Plain Area and the project review area, a compilation of public comments and the Agency's response to those comments, are available to the public and may be inspected during normal business hours at the U.S. Environmental Protection Agency, Water Management Division, 20 Federal Plaza, New York, New York 10278. In addition, copies of a map showing the designated area and a responsiveness summary to public comment are available upon request. **FOR FURTHER INFORMATION CONTACT:** John Malleck, Chief, Office of Ground Water Management, Water Management Division, 20 Federal Plaza, New York, New York 10278 (212) 284-5835.

SUPPLEMENTARY INFORMATION: Notice is hereby given that pursuant to section 1424(e) of the Safe Drinking Water Act (42 U.S.C. 300f, 300h-3(e), Pub. L. 93-523), the Administrator of the U.S. Environmental Protection Agency (EPA) has determined that the New Jersey Coastal Plain Aquifer System, underlying the New Jersey Coastal Plain Area, is the sole or principal source of

drinking water for the Counties of Monmouth, Burlington, Ocean, Camden, Gloucester, Atlantic, Salem, Cumberland, Cape May and portions of Mercer and Middlesex Counties, New Jersey. Pursuant to section 1424(e), Federally-assisted projects proposed for construction in the New Jersey Coastal Plain Area and the project review area within portions of its streamflow source zone will be subject to EPA review. The streamflow source zone for the New Jersey Coastal Plain Aquifer System includes upstream portions of the Delaware River Basin in the States of Delaware (New Castle County), New Jersey (Mercer-part, Hunterdon-part, Sussex-part, and Warren Counties), New York (Delaware, Orange, Sullivan and Ulster Counties), and Pennsylvania (Berks-part, Bucks, Carbon-part, Chester-part, Delaware, Lackawanna-part, Lancaster, Lehigh, Luzerne-part, Monroe Montgomery, Northampton, Philadelphia, Pike, Schuylkill and Wayne Counties). The project review area includes that portion of the streamflow source zone which lies within two miles of the Delaware River in the States of New Jersey (in Mercer, Hunterdon, Sussex and Warren Counties), Delaware (in New Castle County), Pennsylvania (in Delaware, Philadelphia, Bucks, Monroe, Northampton, Pike and Wayne Counties) and New York (in Delaware, Orange and Sullivan Counties).

I. Background

Section 1424(e) of the Safe Drinking Water Act states: (e) If the Administrator determines, on his own initiative or upon petition, that an area has an aquifer which is the sole or principal drinking water source for the area and which, if contaminated, would create a significant hazard to public health, he shall publish notice of that determination in the Federal Register. After the publication of any such notice no commitment for Federal financial assistance (through a grant, contract, loan guarantee, or otherwise) may be entered into for any project which the Administrator determines may contaminate such aquifer through a recharge zone so as to create a significant hazard to public health, but a commitment for Federal financial assistance may, if authorized under another provision of law, be entered into to a plan or design the project to assure that it will not so contaminate the aquifer.

On December 4, 1978 the Environmental Defense Fund, Inc. and the Sierra Club New Jersey Chapter petitioned the EPA Administrator to determine that the Counties of Monmouth, Burlington, Ocean, Camden,

Gloucester, Atlantic, Salem, Cumberland, Cape May and portions of Mercer and Middlesex Counties, New Jersey, constitute an area whose aquifer system is "the sole or principal drinking water source for the area and which, if contaminated, would create a significant hazard to public health." On March 21, 1979, EPA published the petition in the Federal Register. Public hearings on the petition request were held May 1, 15 and 17, 1979 in Lindenwold, Trenton, Freehold and Pomona, New Jersey. A May 19, 1983 Federal Register notice announced the availability of additional technical information and the extension of public comment period to July 13, 1983.

II. Basis for Determination

Among the factors to be considered by the Administrator in connection with the designation of an area under section 1424(e) are:

(1) Whether the aquifer is the area's sole or principal source of drinking water and (2) whether contamination of the aquifer would create a significant hazard to public health.

On the basis of information available to this Agency, the Administrator has made the following findings, which are the basis for the determination noted above:

(1) The New Jersey Coastal Plain Area depends upon the underlying Coastal Plain Aquifer System for seventy-five (75) per cent or more of its drinking water to serve 3 million people.

(2) Data show that the formations of the New Jersey Coastal Plain Area are hydrologically interconnected such that they respond collectively as an interrelated aquifer system.

(3) If the aquifer system were to become contaminated, exposure of the persons served by the system would constitute a significant hazard to public health.

(4) Alternative supplies capable of providing fifty (50) per cent or more of the drinking water to the designated area are not available at similar economic costs.

The New Jersey Coastal Plain Aquifer System is highly susceptible to contamination through its recharge zone from a number of sources, including but not limited to, chemical spills, leachate from landfills, stormwater runoff, highway de-icing, faulty septic systems, wastewater treatment systems and waste disposal lagoons. The aquifer is also susceptible to contamination to a lesser degree from the same sources, through its streamflow source zone. Since ground-water contamination can be difficult or impossible to reverse

completely and since the aquifer in this area is solely or principally relied upon for drinking water purposes by the population of the New Jersey Coastal Plain Area, contamination of the aquifer could pose a significant hazard to public health.

III. Description of the New Jersey Coastal Plain Area Aquifer System, Its Recharge Zone and Its Streamflow Source Zone

The New Jersey Coastal Plain Aquifer System consists of a wedge-shaped mass of unconsolidated sediments composed of clay, silt, sand and gravel. The wedge thins to a feathered edge along the Fall Line and attains a thickness of over 6,000 feet at the tip of Cape May County, New Jersey.

These sediments range in age from Cretaceous to Holocene and can be classified as continental, coastal or marine deposits. There are five major aquifers within the Coastal Plain Aquifer System. They are the Potomac-Raritan-Magothy Aquifer System, Englishtown Aquifer, Wenonah-Mount Laurel Aquifer, Kirkwood Aquifer and the Cobansey Aquifer. Natural recharge to the New Jersey Coastal Plain Aquifer System occurs primarily through direct precipitation on the outcrop area of the geologic formations. A smaller component of natural recharge to the deeper layers of the system occurs by vertical leakage from the upper layers. This accounts for a small percentage of the total amount of recharge; however, over a large area and a long period of time the amount of water transmitted can be significant.

The New Jersey Coastal Plain Aquifer discharges to the surface through streams, springs and evapotranspiration. Many streams ultimately flow into bays or directly into the ocean. Development of the ground-water reservoir as a water supply source constitutes another discharge component which today accounts for a significant portion of discharge from the overall system. In certain areas (e.g. along the Delaware River) heavy pumping has caused a reversal in the normal discharge from the aquifer (Raritan-Magothy) such that the surface stream (Delaware River) now recharges the aquifer. This phenomenon implies that, in addition to the New Jersey Coastal Plain Area, the Delaware River Basin within Delaware, New Jersey, Pennsylvania and New York must be regarded as a streamflow source zone (an upstream headwaters area which drains into a recharge zone), which flows into the Coastal Plain Area.

IV. Information Utilized in Determination

The information utilized in this determination includes the petition, written and verbal comments submitted by the public, and various technical publications. The above data are available to the public and may be inspected during normal business hours at the U.S. Environmental Protection Agency, Region II, Water Management Division, 26 Federal Plaza, New York, New York 10278.

V. Project Review

When the EPA Administrator publishes his determination for a sole or principal drinking water source, no commitment for Federal financial assistance may be made if the Administrator finds that the Federally-assisted project may contaminate the aquifer through a recharge zone so as to create a significant hazard to public health . . . Safe Drinking Water Act section 1424(e), 42 U.S.C. 300h-3(e). In many cases, these Federally-assisted projects would also be analyzed in an "Environmental Impact Statement" (EIS) under the National Environmental Policy Act (NEPA), 42 U.S.C. 4332(2)(C). All EISs, as well as any other proposed Federal actions affecting an EPA program or responsibility, are required by Federal law (under the so-called "NEPA/308" process) to be reviewed and commented upon by the EPA Administrator. Therefore, in order to streamline EPA's review of the possible environmental impacts on designated aquifers, when an action is analyzed in an EIS, the two reviews will be consolidated, and both authorities will be cited. The EPA review (under the Safe Drinking Water Act) of Federally-assisted projects potentially affecting sole or principal source aquifers, will be included in the EPA review (under the "NEPA/308" process) of any EIS accompanying the same Federally-assisted project. The letter transmitting EPA's comments on the final EIS to the lead agency will be the vehicle for informing the lead agency of EPA's actions under section 1424(e).

All Federally-assisted proposed projects will be reviewed, within the New Jersey Coastal Plain Area (Counties of Monmouth, Burlington, Ocean, Camden, Gloucester, Atlantic, Salem, Cumberland and Cape May, and portions of Mercer and Middlesex Counties, New Jersey (as delineated on maps included in the petition), and that

portion of the streamflow source zone which lies within two miles of the Delaware River in the States of New Jersey (in Mercer, Hunterdon, Sussex and Warren Counties), Delaware (in New Castle County), Pennsylvania (in Delaware, Philadelphia, Bucks, Monroe, Northampton, Pike and Wayne Counties) and New York (in Delaware, Orange and Sullivan Counties) (as delineated on maps included in the public record). Outside the New Jersey Coastal Plain Area and further than two miles from the Delaware River in the streamflow source zone, only those Federally-assisted proposed projects requiring the preparation of an EIS will be reviewed. The Agency has chosen a two-mile limit for the project review area along the Delaware River based on the climate and hydrologic setting of the area. The two-mile distance is consistent with the two-mile review radius included in the EPA guidelines for Ground-Water Classification and is protective of human health.

VI. Summary and Discussion of Public Comments

There has been much controversy over the possible designation of this aquifer system. The majority of the comments from the original 1979 public hearings were in direct opposition to such a designation. More than half of all responses received were against designation. Several commenters felt constrained by the original comment period and thereby requested an extension. EPA complied with this request on two occasions, once by announcing at the four public hearings it held throughout the area under consideration that the agency had extended the formal comment period from May 14, 1979, to December 31, 1979, and again in a May 19, 1983 Federal Register Notice that announced the availability of additional information and extension of the public comment period to July 15, 1983. Although a number of ground-water protection measures are available at the Federal, State and local level, none of these, either individually or collectively, permit EPA to act as directly as would a sole source aquifer designation in the review and approval of Federally-assisted projects. In addition, EPA feels that the sole source project review process will foster integration rather than duplication of environmental review efforts. Memoranda of Understanding have been negotiated with various Federal agencies with the purpose of streamlining the review process and minimizing project delays. Most of the commenters expressed concern that a

¹ 42 U.S.C. § 7602 requires EPA to conduct this review. The "308" in a "NEPA/308" derives from the original source of this general requirement: Section 308 of the Clean Air Act.

designation would be a duplication of efforts already existing on the state and local levels. Some commenters felt that a sole source aquifer designation would give EPA the power to reject any applications for Federally-funded projects indiscriminately and to delay any project underway. Another main concern of many commenters was that a designation would cause a strong negative economic impact on the area in question and curtail needed development, thus eliminating jobs. EPA is sympathetic to the concerns of the commenters; however, the Agency feels that a sole source aquifer designation would not interfere with economic development. Federal financial assistance will be withheld only in those instances where it is determined that a proposed project may contaminate the aquifer so as to create a significant hazard to public health and no acceptable remedial measures are available to prevent the potential hazard.

Dated: June 16, 1988.

Lon M. Thomas,
Administrator.

[FR Doc. 88-14293 Filed 6-23-88; 8:45 am]
BILLING CODE 1505-01-01

[OPTS-58645; FRL-3404-5]

Toxic and Hazardous Substances; Certain Chemicals Premanufacture Notices

AGENCY: Environmental Protection
Agency (EPA).

ACTION: Notice.

SUMMARY: Section 5(a)(1) of the Toxic Substances Control Act (TSCA) requires any person who intends to manufacture or import a new chemical substance to submit a premanufacture notice (PMN) to EPA at least 90 days before manufacture or import commences. Statutory requirements for section 5(a)(1) premanufacture notices are discussed in the final rule published in the Federal Register of May 13, 1983 (48 FR 21722). In the Federal Register of November 12, 1984 (49 FR 40066) (40 CFR 723.250), EPA published a rule which granted a limited exemption from certain PMN requirements for certain types of polymers. Notices for such polymers are reviewed by EPA within 21 days of receipt. This notice announces receipt of nine such PMNs and provides a summary of each.

DATES: Close of Review Period:

Y 88-192, 88-193—June 3, 1988.

Y 88-194—June 7, 1988.

Y 88-195—May 17, 1988.

T 88-196—June 8, 1988.

Y 88-197—June 14, 1988.

Y 88-198—June 18, 1988.

Y 88-199—June 10, 1988.

Y 88-200—June 23, 1988.

FOR FURTHER INFORMATION CONTACT:
Stephanie Roan, Premanufacture Notice
Management Branch, Chemical Control
Division (TS-704), Office of Toxic
Substances, Environmental Protection
Agency, Rm. E-611, 401 M Street SW.,
Washington, DC 20460 (202) 382-3725.

SUPPLEMENTARY INFORMATION: The following notice contains information extracted from the non-confidential version of the submission provided by the manufacturer on the PMNs received by EPA. The complete non-confidential document is available in the Public Reading Room NE-C004 at the above address between 8:00 a.m. and 4:00 p.m., Monday through Friday, excluding legal holidays.

Y 88-192

Manufacturer: Confidential.
Chemical: (G) Hydroxy function
acrylic resin.

Use/Production: (S) Coatings. Prod.
range: Confidential.

Y 88-193

Manufacturer: Confidential.
Chemical: (G) Polyurethane resin.
Use/Production: (S) Coating. Prod.
range: Confidential.

Y 88-194

Manufacturer: Sybrn Chemicals Inc.
Chemical: (G) Copolymer of aliphatic
esters of 2-propenoic acid with
homocyclic and heterocyclic aromatic
vinyl compounds, reaction product
with aliphatic polyam na.

Use/Production: (G) Waste and
process water purification. Prod. range:
Confidential.

Y 88-195

Manufacturer: Confidential.
Chemical: (G) Dibasic acid polyol
polyester.

Use/Production: (G) Used in coatings.
Prod. range: Confidential.

Y 88-196

Manufacturer: Confidential.
Chemical: (S) Rosin,
dicyclopentadiene, dimer fatty acid
polymer.

Use/Production: (S) Printing ink
vehicles. Prod. range: 3,000,000-3,700,000
kg/yr.

Y 88-197

Manufacturer: Reichhold Chemicals
Inc.

Chemical: (G) Sunflower oil alkyl.

Use/Production: (S) Architectural
trade sales coating. Prod. range:
Confidential.

Y 88-198

Manufacturer: Confidential.
Chemical: (G) Aliphatic polyester
urethane.

Use/Production: (G) Coatings. Prod.
range: Confidential.

Y 88-199

Manufacturer: C.J. Osborn.
Chemical: (G) Polyester.
Use/Production: (S) Pigmented and
clear finish. Prod. range: Confidential.

Y 88-200

Manufacturer: Confidential.
Chemical: (G) Styrene/acrylic
copolymer.

Use/Production: Coatings and inks.
Prod. range: Confidential.

Date: June 13, 1988.

Steve Newburg-Klein,

Acting Chief, Public Data Branch, Information
Management Division, Office of Toxic
Substances.

[FR Doc. 88-14292 Filed 6-23-88; 8:45 am]
BILLING CODE 1505-01-01

FEDERAL COMMUNICATIONS COMMISSION

Public Information Collection
Requirement Submitted to Office of
Management and Budget for Review

June 16, 1988.

The Federal Communications
Commission has submitted the following
information collection requirement to
OMB for review and clearance under
the Paperwork Reduction Act of 1980 (44
U.S.C. 3507).

Copies of this submission may be
purchased from the Commission's copy
contractor, International Transcription
Service, (202) 857-3800; 2100 M Street
NW., Suite 140, Washington, DC 20007.
For further information on this
submission contact Judy Boley, Federal
Communications Commission, (202) 633-
7313. Persons wishing to comment on
this information collection should
contact Yvette Flynn, Office of
Management and Budget, Room 3235
NEOB, Washington, DC 20503, (202) 395-
3785.

OMB Number: 3080-0025.

Title: Application for Restricted
Radiotelephone Operator Permit—
Limited Use.

Form Number: FCC 733.

Action: Revision.

Respondents: Individuals or
households.

REFERENCE 34

Uncontrolled Hazardous Waste Site Ranking System

A Users Manual (HW-10)

**Originally Published in
the July 16, 1982, *Federal Register***

**United States
Environmental Protection
Agency**

1984

TABLE 2
PERMEABILITY OF GEOLOGIC MATERIALS*

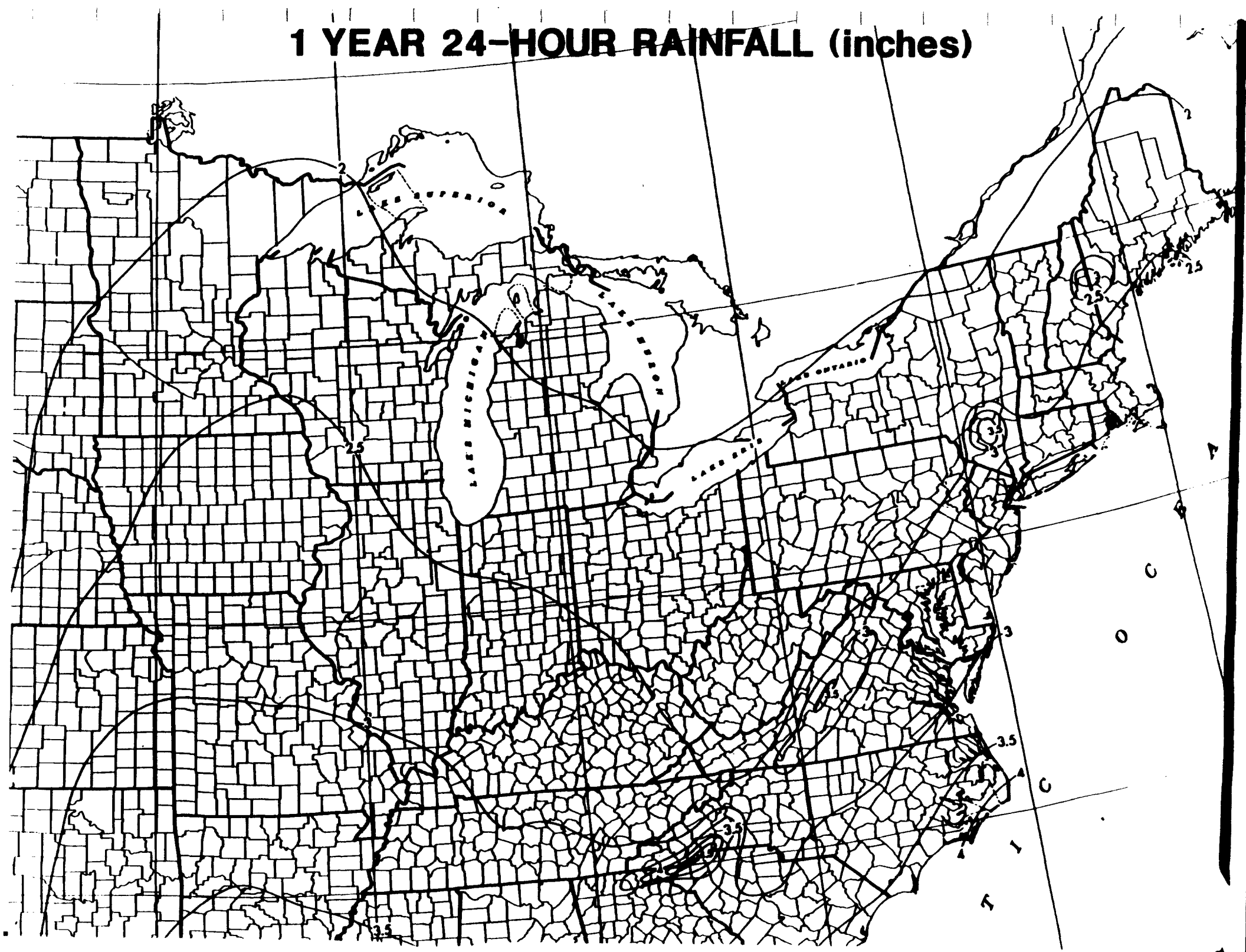
Type of Material	Approximate Range of Hydraulic Conductivity	Assigned Value
Clay, compact till, shale; unfractured metamorphic and igneous rocks	$<10^{-7}$ cm/sec	0
Silt, loess, silty clays, silty loams, clay loams; less permeable limestone, dolomites, and sandstone; moderately permeable till	$10^{-5} - 10^{-7}$ cm/sec	1
Fine sand and silty sand; sandy loams; loamy sands; moderately permeable limestone, dolomites, and sandstone (no karst); moderately fractured igneous and metamorphic rocks, some coarse till	$10^{-3} - 10^{-5}$ cm/sec	2
Gravel, sand; highly fractured igneous and metamorphic rocks; permeable basalt and lavas; karst limestone and dolomite	$>10^{-3}$ cm/sec	3

*Derived from:

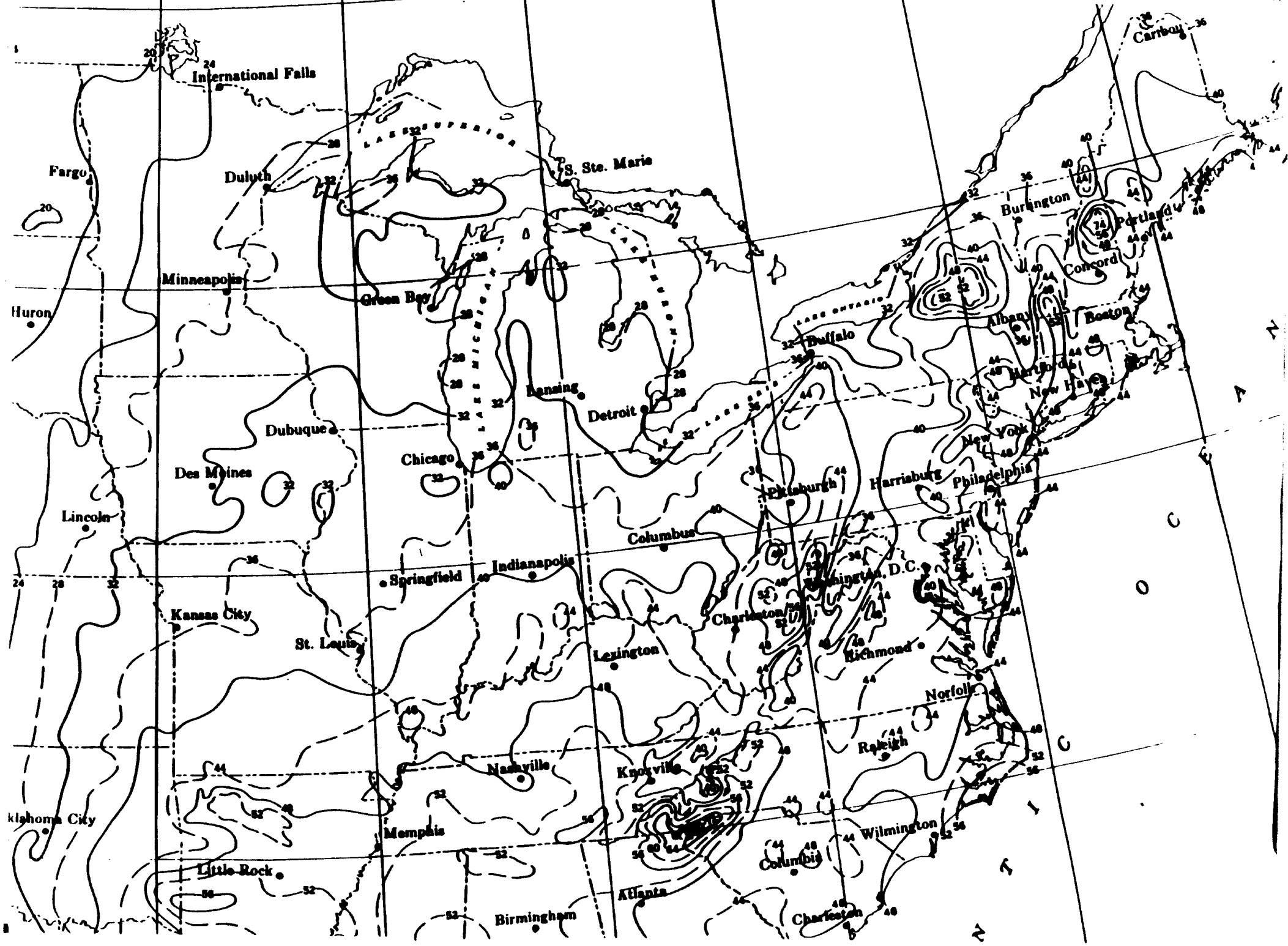
Davis, S. W., Porosity and Permeability of Natural Materials in Flow-Through Porous Media, R.J.M. DeWitt ed., Academic Press, New York, 1969

Freeze, R.A. and J.A. Cherry, Groundwater, Prentice-Hall, Inc., New York, 1979

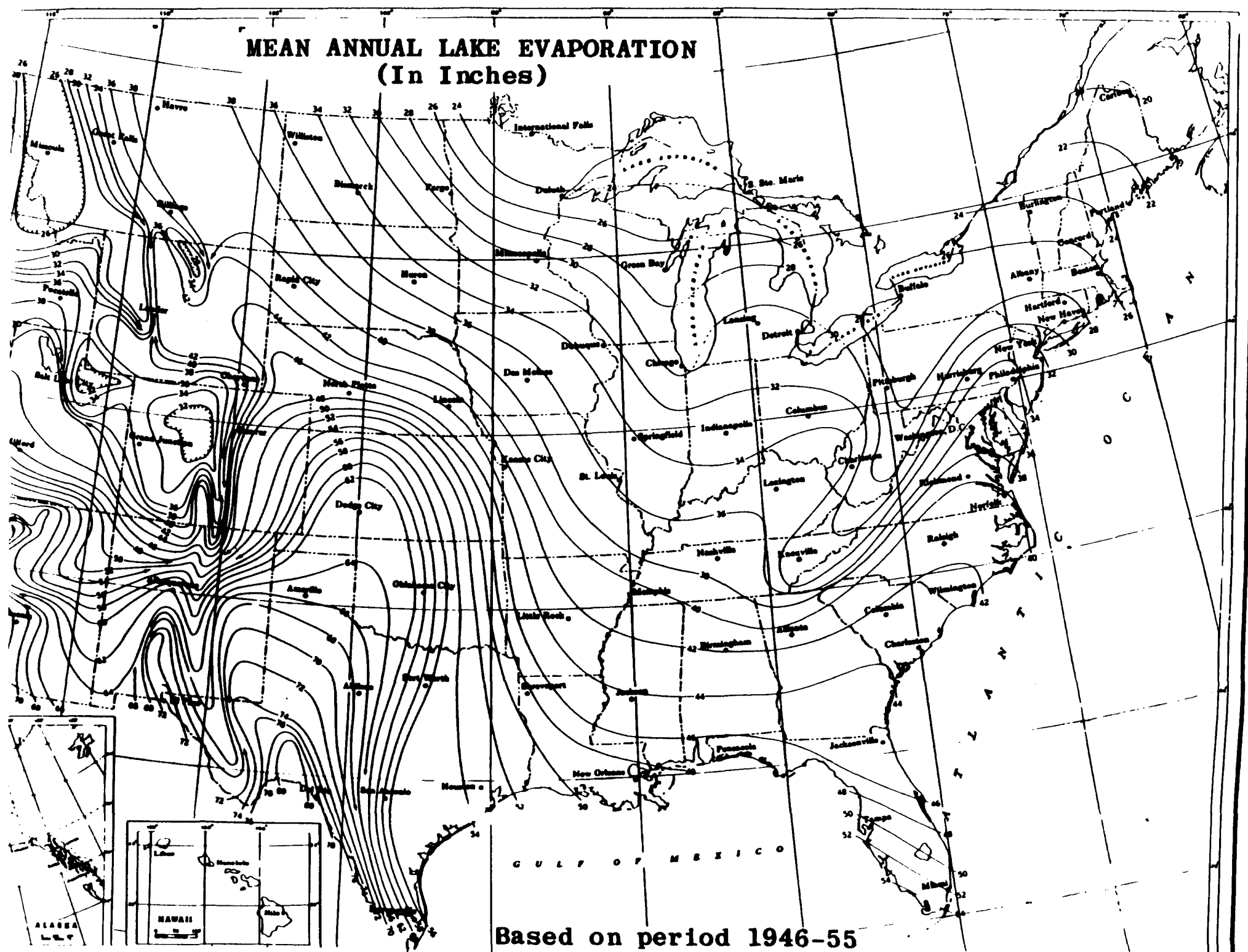
1 YEAR 24-HOUR RAINFALL (inches)



NORMAL ANNUAL TOTAL PRECIPITATION (Inches)



MEAN ANNUAL LAKE EVAPORATION (In Inches)



Based on period 1946-55

REFERENCE 35

CONTROL NO.:

02-8909-12

DATE:

9/27/89

TIME:

4:00

DISTRIBUTION:

OWENS ILLINOIS Inc.

BETWEEN:

Mr. Jim Scott

OF:

NEW JERSEY
AMERICAN WATER
COMPANY

PHONE:

201 (842) 6900

AND:

Joseph SARIANO

(NUS)

DISCUSSION:

I asked Mr. Scott about water use within 3 miles of the facility. Mr. Scott said: surface water was primarily used for drinking. Although, it is also used for commercial, industrial, and irrigation purposes. Ninety to 95% of the water used by the American Water Co. is surface water. The water intake is from Swimming River, in Cotts Neck N.J. which is greater than 3 miles away from the site. Only a small part of the population of Holmdel is served by the American Water Co. Most of the population within 3 miles of the site is served by The Shoreland Water Co. The American Water Co. serves a total of 1/2 million people in 23 municipalities. J.S. 9/28/89

ACTION ITEMS:

REFERENCE 36

NUS CORPORATION AND SUBSIDIARIES

TELECON NOTE

CONTROL NO.:

02-8909-12

DATE:

10/2/89

TIME:

10 47

DISTRIBUTION:

OWENS ILLINOIS INC.

BETWEEN:

Mr. Michael Walsh

OF:

Shoreland Water
Company

PHONE:

201 (264) 5510

AND:

Joseph Soriano

(NUS)

DISCUSSION:

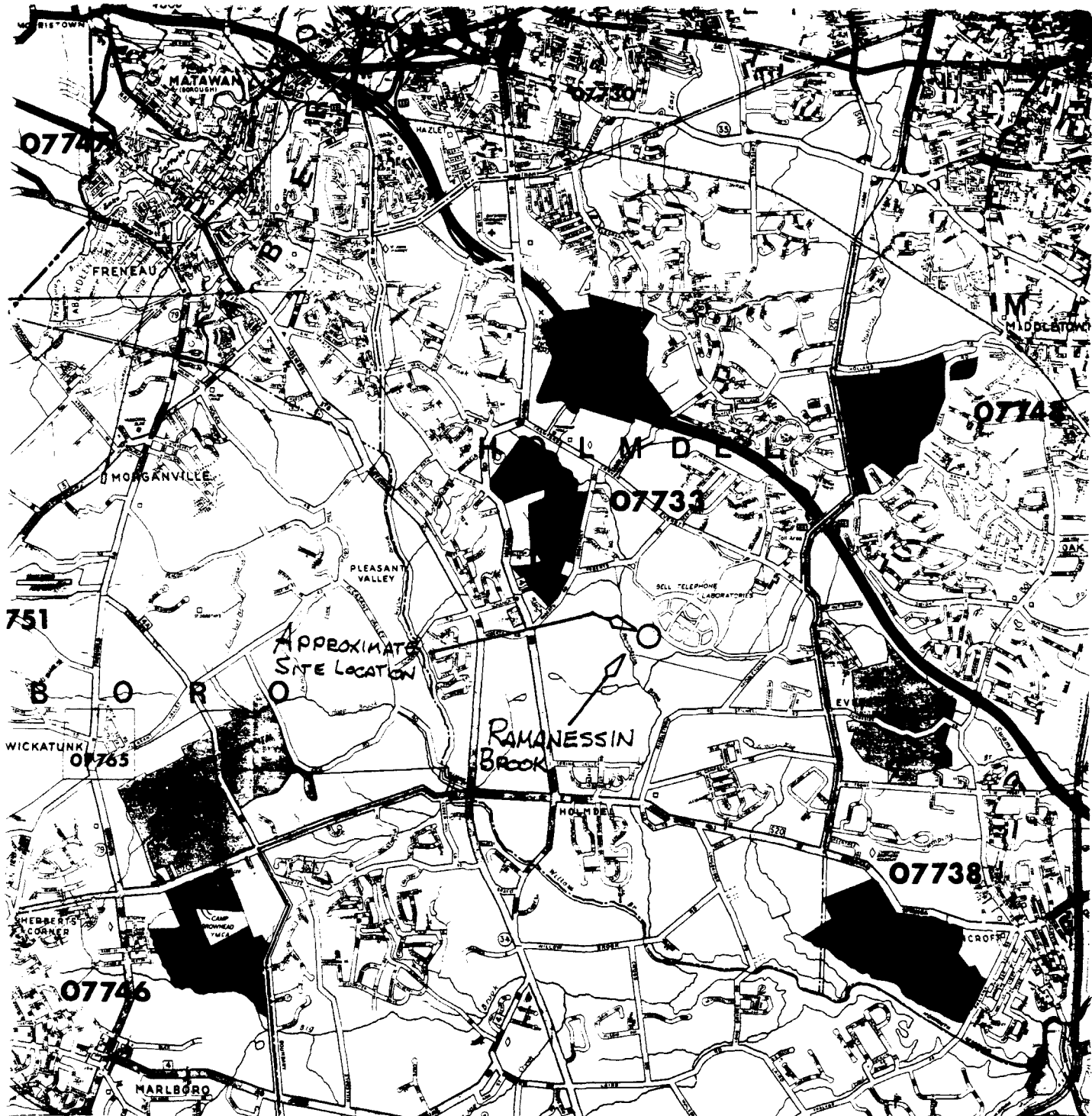
I asked Mr. Walsh if his office would provide me with information on groundwater. Mr. Walsh said. The Shoreland Water Company gets all its water from wells. Groundwater is used for drinking, commercial, industrial and irrigation purposes. The nearest well used for drinking is approximately 1 mile from the site at 1709 Union Ave (Wells 1 & 2) their depth 350 to 370 feet. The population served within a 3 mile radius of the site would be approximately 35,000. (as an estimate). J.S. 10/2/89

ACTION ITEMS:

REFERENCE 37

FOR 3-MILE
RADIUS MAP
SEE FOLDER IN
BACK OF REPORT

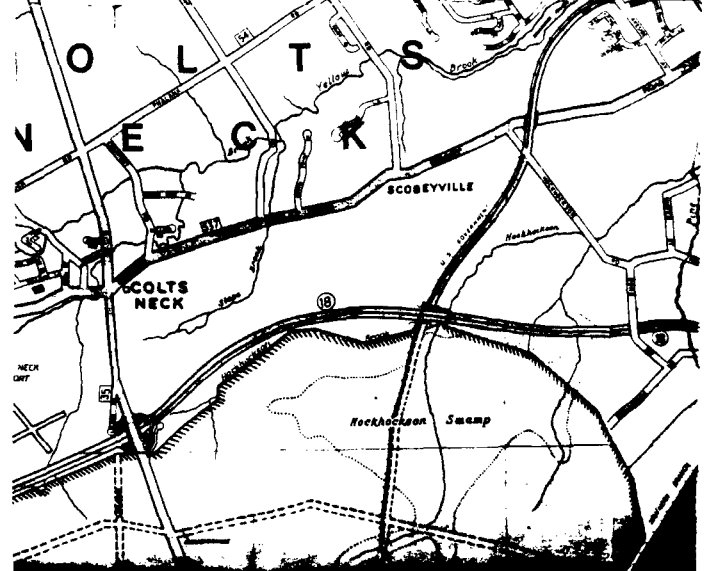
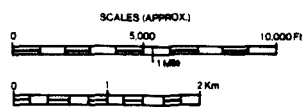
REFERENCE 38



Hagstrom map of
Monmouth County
 New Jersey



- | | | |
|--|---|---|
| <ul style="list-style-type: none"> Main Through Routes Highways Under Construction Proposed Highways Other Roads and Streets Garden State Pkwy Entrance and Exit N.J. Turnpike Railroad Lines and Stations | <ul style="list-style-type: none"> Highway Route Numbers Interstate U.S. State County State Wide Secondary Highway System Schools Elementary Vocational High School Zip Code Boundaries and Numbers Points of Interest | <ul style="list-style-type: none"> Parks Cemeteries Golf Courses Airports Federal Lands State Lands (Existing) State Lands (Prop.) Hospitals Municipal Boundaries County Boundaries |
|--|---|---|



REFERENCE 39

PORTION OF DIVIDING CREEK MAP

SCALE: 1:24,000

1984

HOW TO USE THIS ATLAS

The Atlas contains reductions of all 1:24,000 National Wetlands Inventory maps. Maps appear in alphabetical order. Map names can be located on the index map (Figure 2). Each map shows the configuration, location and type of wetlands and deepwater habitats found within a given area.

WETLAND LEGEND

Wetland data are displayed on maps by a series of letters and numbers (alpha-numerics). Mixing of classes and subclasses are represented by a diagonal line. The more common symbols are shown below; less common symbols have been omitted for simplicity. For identifying these latter symbols, the reader should refer to an actual NWI map legend.

Examples of Alpha-numerics:

E2EMN6 = Estuarine (E), Intertidal(2), Emergent Wetland(EM), Regularly Flooded(N), Oligohaline(6)

E2FL = Estuarine(E), Intertidal(2), Flat(FL)

PF01 = Palustrine(P), Forested Wetland(FO), Broad-leaved Deciduous(1)

PEM/OW = Palustrine(P), Emergent Wetland/Open Water(EM/OW)

PFO/SS1 = Palustrine(P), Forested Wetland/Scrub-Shrub Wetland(FO/SS), Broad-leaved Deciduous(1)

SYMBOLOLOGY

Systems and Subsystems:

M 1	=	Marine Subtidal	R 3	=	Riverine Upper Perennial
M 2	=	Marine Intertidal	R 4	=	Riverine Intermittent
E 1	=	Estuarine Subtidal	L 1	=	Lacustrine Limnetic
E 2	=	Estuarine Intertidal	L 2	=	Lacustrine Littoral
R 1	=	Riverine Tidal	P	=	Palustrine
R 2	=	Riverine Lower Perennial	U	=	Upland

Classes (subclasses and modifiers designated where appropriate):

AB = Aquatic Bed

BB = Beach/Bar

EM = Emergent Wetland

EMN6 = Emergent Wetland, Regularly Flooded, Oligohaline

EMP6 = Emergent Wetland, Irregularly Flooded, Oligohaline

EMR = Emergent Wetland, Seasonally Flooded-Tidal

FL = Flat

FO1 = Forested Wetland, Broad-leaved Deciduous

FO2 = Forested Wetland, Needle-leaved Deciduous

FO4 = Forested Wetland, Needle-leaved Evergreen

OW = Open Water/Unknown Bottom

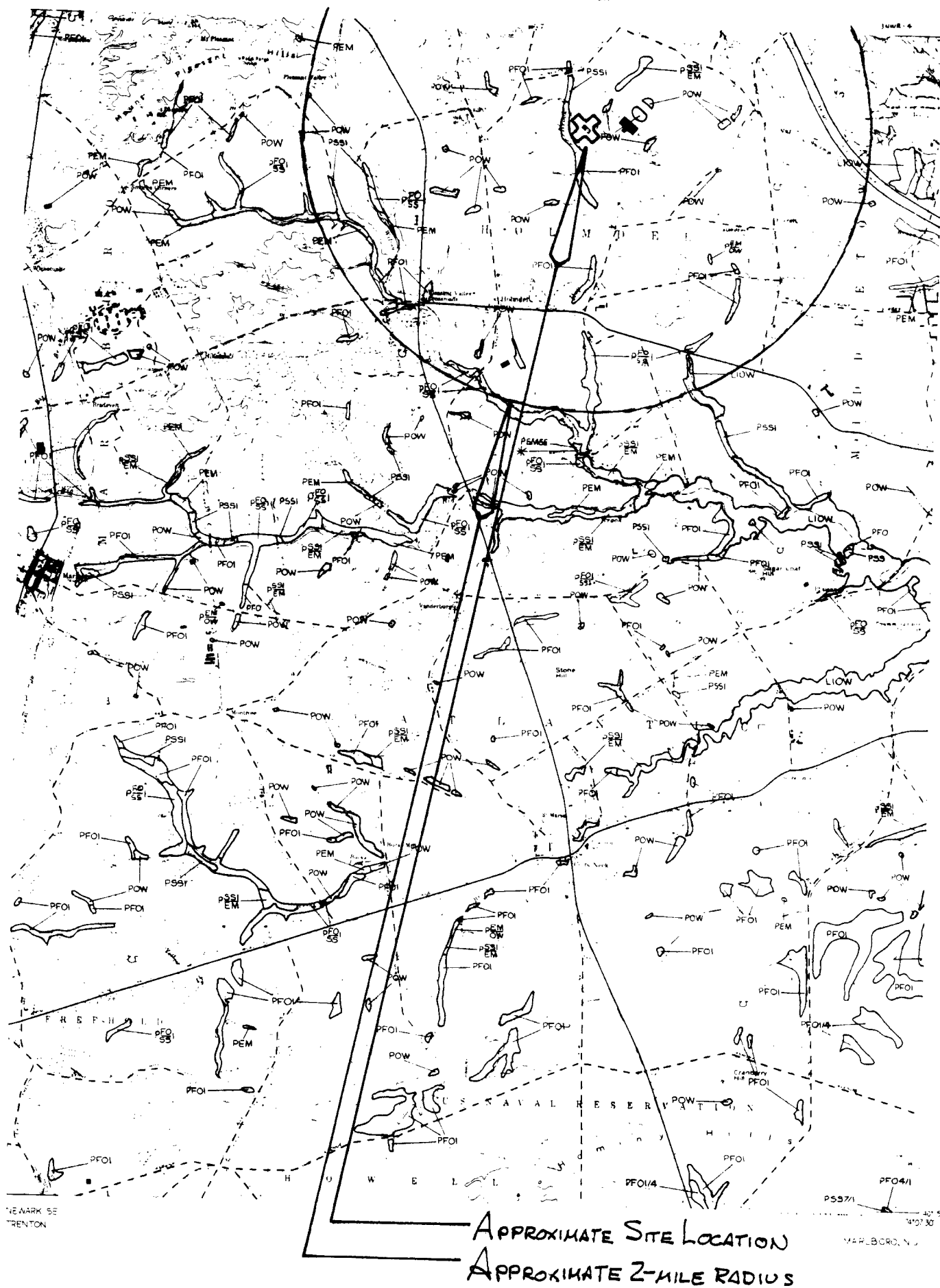
SS1 = Scrub-Shrub Wetland, Broad-leaved Deciduous

SS3 = Scrub-Shrub Wetland, Broad-leaved Evergreen

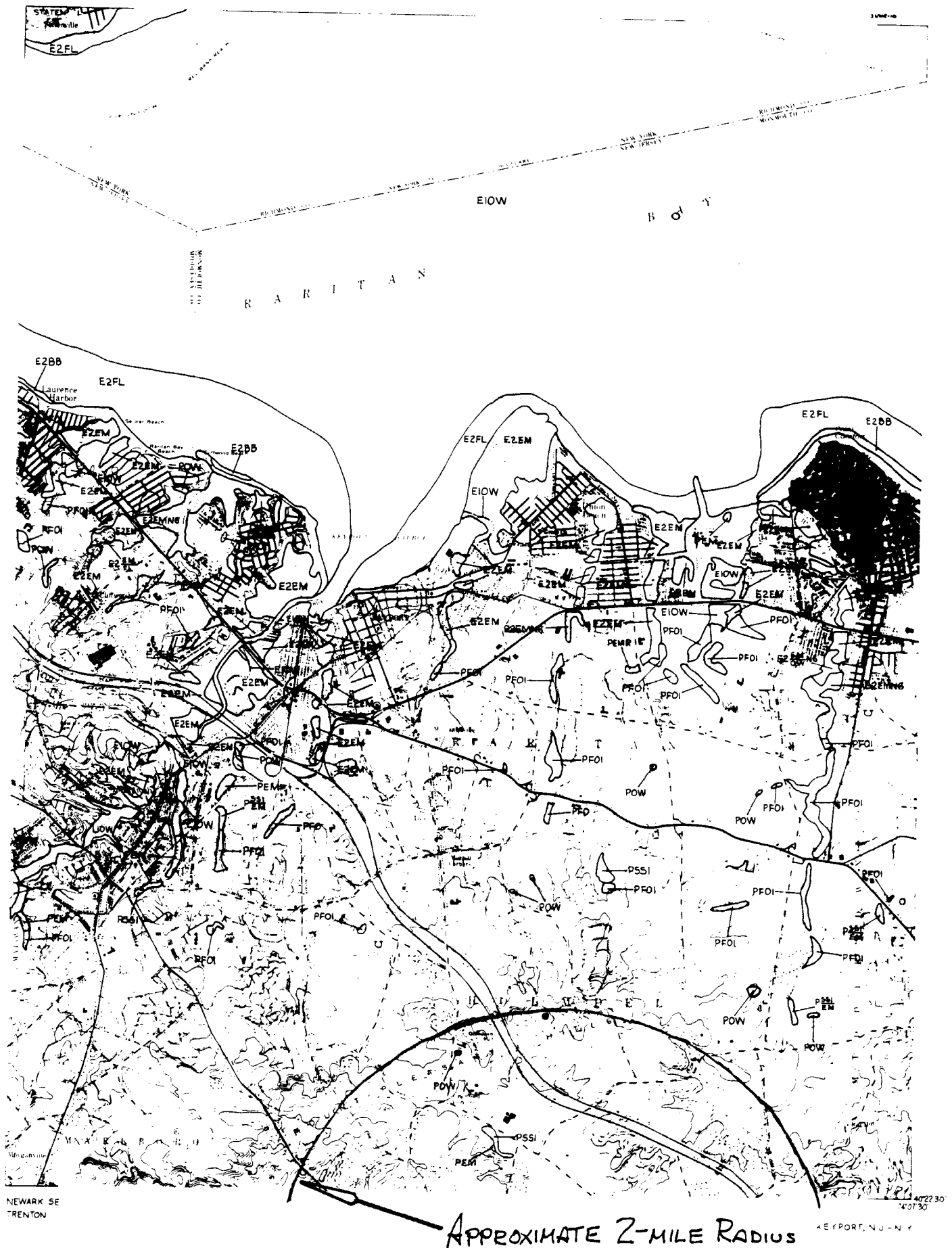
SS4 = Scrub-Shrub Wetland, Needle-leaved Evergreen

SS5 = Scrub-Shrub Wetland, Dead

SS7 = Scrub-Shrub Wetland, Evergreen



NATIONAL WETLANDS INVENTORY
UNITED STATES DEPARTMENT OF THE INTERIOR



REFERENCE 40

Endangered Species Wildlife and Plants

REC-1
MAY 1972
U.S. DEPT. OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
SENT TO

APR 10 1972

50 CFR 17.12



Title 50—Wildlife and Fisheries

PART 17—ENDANGERED AND THREATENED WILDLIFE AND PLANTS

* * * *

Subpart B—Lists

Source: 48 FR 34182, July 27, 1983, unless otherwise noted.

§ 17.11 Endangered and threatened wildlife.

(a) The list in this section contains the names of all species of wildlife which have been determined by the Services to be Endangered or Threatened. It also contains the names of species of wildlife treated as Endangered or Threatened because they are sufficiently similar in appearance to Endangered or Threatened species (see § 17.50 *et seq.*).

(b) The columns entitled "Common Name," "Scientific Name," and "Vertebrate Population Where Endangered or Threatened" define the species of wildlife within the meaning of the Act. Thus, differently classified geographic populations of the same vertebrate subspecies or species shall be identified by their differing geographic boundaries, even though the other two columns are identical. The term "Entire" means that all populations throughout the present range of a vertebrate species are listed. Although common names are included, they cannot be relied upon for identification of any specimen, since they may vary greatly in local usage. The Services shall use the most recently accepted scientific name. In cases in which confusion might arise, a synonym(s) will be provided in parentheses. The Services shall rely to the extent practicable on the *International Code of Zoological Nomenclature*.

(c) In the "Status" column the following symbols are used: "E" for Endangered, "T" for Threatened, and "E [or T] (S/A)" for similarity of appearance species.

(d) The other data in the list are nonregulatory in nature and are provided for the information of the reader. In the annual revision and compilation of this title, the following information may be amended without public notice: the spelling of species' names, historical range, footnotes, references to certain other applicable portions of this title, synonyms, and more current names. In any of these revised entries, neither the species, as defined in paragraph (b) of this section, nor its status may be changed without following the procedures of Part 424 of this title.

(e) The "historic range" indicates the known general distribution of the species or subspecies as reported in the current scientific literature. The present distribution may be greatly reduced from this historic range. This column does not imply any limitation on the application of the prohibitions in the Act or implementing rules. Such prohibitions apply to all individuals of the species, wherever found.

(f)(1) A footnote to the **Federal Register** publication(s) listing or reclassifying a species is indicated under the column "When listed." Footnote numbers to §§ 17.11 and 17.12 are in the same numerical sequence, since plants and animals may be listed in the same **Federal Register** document. That document, at least since 1973, includes a statement indicating the basis for the listing, as well as the effective date(s) of said listing.

(2) The "Special rules" and "Critical habitat" columns provide a cross reference to other sections in Parts 17, 222, 226, or 227. The "Special rules" column will also be used to cite the special rules that describe experimental populations and determine if they are essential or nonessential. Separate listing will be made for experimental populations, and the status column will include the following symbols: "XE" for an essential experimental population and "XN" for a nonessential

experimental population. The term "NA" (not applicable) appearing in either of these two columns indicates that there are no special rules and/or critical habitat for that particular species. However, all other appropriate rules in Parts 17, 217–227, and 402 still apply to that species. In addition, there may be other rules in this Title that relate to such wildlife, e.g., port-of-entry requirements. It is not intended that the references in the "Special rules" column list all the regulations of the two Services which might apply to the species or to the regulations of other Federal agencies or State or local governments.

(g) The listing of a particular taxon includes all lower taxonomic units. For example, the genus *Hylobates* (gibbons) is listed as Endangered throughout its entire range (China, India, and SE Asia); consequently, all species, subspecies, and populations of that genus are considered listed as Endangered for the purposes of the Act. In 1978 (43 FR 6230–6233) the species *Haliaeetus leucocephalus* (bald eagle) was listed as Threatened in "USA (WA, OR, MN, WI, MI)" rather than its entire population; thus, all individuals of the bald eagle found in those five States are considered listed as Threatened for the purposes of the Act.

(h) The "List of Endangered and Threatened Wildlife" is provided below:

Editorial Note: This is a compilation and special reprint of 50 CFR 17.11 and 17.12 and is current as of the date shown on the cover. Minor changes and corrections to the October 1, 1986, compilation of 50 CFR have been incorporated in this printing, as well as all published final rules that have subsequently appeared in the **Federal Register**. Otherwise no entry in these lists has been significantly affected. This list has been prepared by the staff of the Office of Endangered Species, U.S. Fish and Wildlife Service, Washington, D.C. 20240. Readers are requested to advise the Service of any errors in this list. Copies are available from the Publication Unit, US Fish and Wildlife Service, Washington, D.C. 20240.

Species		Historic range	Vertebrate population where endangered or threatened	Status	When listed	Critical habitat	Special rules
Common name	Scientific name						
MAMMALS							
Anoa, lowland	<i>Bubalus depressicornis</i> (= <i>B. anoa depressicornis</i>)	Indonesia	Entire	E	3	NA	NA
Anoa, mountain	<i>Bubalus quarlesi</i> (= <i>B. anoa quarlesi</i>)	do	do	E	15	NA	NA
Antelope, giant sable	<i>Hippotragus niger variani</i>	Angola	do	E	15	NA	NA
Argali	<i>Ovis ammon hodgsoni</i>	China (Tibet, Himalayas)	do	E	15	NA	NA
Armadillo, giant	<i>Priodontes maximus</i> (= <i>giganteus</i>)	Venezuela and Guyana to Argentina	do	E	15	NA	NA
Armadillo, pink fairy	<i>Chlamyphorus truncatus</i>	Argentina	do	E	3	NA	NA
Ass, African wild	<i>Equus asinus</i> (= <i>africanus</i>)	Somalia, Sudan, Ethiopia	Somalia, Sudan, Ethiopia	E	3, 22	NA	NA
Ass, Asian wild (= kulan, onager)	<i>Equus hemionus</i>	Southwestern and Central Asia	Entire	E	3	NA	NA
Avahi	<i>Avahi</i> (= <i>Lichanotus</i>) <i>laniger</i> (= entire genus)	Malagasy Republic (= Madagascar)	do	E	3	NA	NA
Aye-Aye	<i>Daubentonia madagascariensis</i>	Malagasy Republic (= Madagascar)	do	E	3	NA	NA
Babirusa	<i>Babirusa babirusa</i>	Indonesia	do	E	15	NA	NA
Baboon, gelada	<i>Theropithecus gelada</i>	Ethiopia	do	T	16	NA	17.40(c)
Bandicoot, barred	<i>Perameles bougainville</i>	Australia	do	E	4	NA	NA
Bandicoot, desert	<i>Perameles eremiana</i>	do	do	E	6	NA	NA
Bandicoot, lesser rabbit	<i>Macrotis leucura</i>	do	do	E	4	NA	NA
Bandicoot, pig-footed	<i>Chaeropus ecaudatus</i>	do	do	E	4	NA	NA
Bandicoot, rabbit	<i>Macrotis lagotis</i>	do	do	E	4	NA	NA
Banteng	<i>Bos javanicus</i> (= <i>banteng</i>)	Southeast Asia	do	E	3	NA	NA
Bat, Bulmer's fruit (flying fox)	<i>Aproteles bulmerae</i>	Papua New Guinea	do	E	139	NA	NA
Bat, bumblebee	<i>Craseonycteris thonglongyai</i>	Thailand	do	E	139	NA	NA
Bat, gray	<i>Myotis grisescens</i>	Central and Southeastern U.S.A.	do	E	13	NA	NA
Bat, Hawaiian hoary	<i>Lasiurus cinereus semotus</i>	U.S.A. (HI)	do	E	2	NA	NA
Bat, Indiana	<i>Myotis sodalis</i>	Eastern and Midwestern U.S.A.	do	E	1	17.95(a)	NA
Bat, little Mariana fruit	<i>Pteropus tokudae</i>	Western Pacific Ocean: U.S.A. (Guam)	do	E	156	NA	NA
Bat, Mariana fruit	<i>Pteropus mariannus mariannus</i>	Western Pacific Ocean: U.S.A. (Guam, Rota, Tinian, Saipan, Agiguan)	Guam	E	156	NA	NA
Bat, Ozark big-eared	<i>Plecotus townsendii ingens</i>	U.S.A. (MO, OK, AR)	Entire	E	85	NA	NA
Bat, Rodrigues fruit (flying fox)	<i>Pteropus rodricensis</i>	Indian Ocean: Rodrigues Island	do	E	139	NA	NA
Bat, Singapore roundleaf horseshoe	<i>Hipposideros ridleyi</i>	Malaysia	do	E	139	NA	NA
Bat, Virginia big-eared	<i>Plecotus townsendii virginianus</i>	U.S.A. (KY, NC, WV, VA)	do	E	85	17.95(a)	NA
Bear, Baluchistan	<i>Ursus thibetanus gedrosianus</i>	Iran, Pakistan	do	E	233	NA	NA
Bear, brown	<i>Ursus arctos pruinosus</i>	China (Tibet)	Guam	E	15	NA	NA
Bear, brown	<i>Ursus arctos arctos</i>	Paleartic	Italy	E	15	NA	NA
Bear, brown or grizzly	<i>Ursus arctos</i> (= <i>U.a. horribilis</i>)	Holarctic	U.S.A.—48 conterminous States.	T	1, 2, 9	NA	17.40(b)
Bear, brown or grizzly	<i>Ursus arctos</i> (= <i>U.a. nelsoni</i>)	do	Mexico	E	3	NA	NA
Beaver	<i>Castor fiber birulai</i>	Mongolia	Entire	E	15	NA	NA
Bison, wood	<i>Bison bison athabasca</i>	Canada, Northwestern U.S.A.	Canada	E	3	NA	NA
Bobcat	<i>Felis rufus escuinapae</i>	Central Mexico	Entire	E	15	NA	NA
Bontebok (antelope)	<i>Damaliscus dorcas dorcas</i>	South Africa	do	E	15	NA	NA
Camel, Bactrian	<i>Camelus bactrianus</i> (= <i>ferus</i>)	Mongolia, China	do	E	15	NA	NA

Species		Historic range	Vertebrate population where endangered or threatened	Status	When listed	Critical habitat	Special rules
Common name	Scientific name						
Bristlebird, western	<i>Dasyornis brachypterus longirostris</i>	Australia	do	E	3	NA	NA
Bristlebird, western rufous	<i>Dasyornis broadbenti littoralis</i>	do	do	E	15	NA	NA
Broadbill, Guam	<i>Myiagra freycineti</i>	Western Pacific Ocean: U.S.A. (Guam)	do	E	156	NA	NA
Bulbul, Mauritius olivaceous	<i>Hypsipetes borbonicus olivaceus</i>	Indian Ocean: Mauritius	do	E	3	NA	NA
Bullfinch, Sao Miguel (finch)	<i>Pyrrhula pyrrhula murina</i>	Eastern Atlantic Ocean: Azores	do	E	3	NA	NA
Bushwren, New Zealand	<i>Xenicus longipes</i>	New Zealand	do	E	3	NA	NA
Bustard, great Indian	<i>Choriotis nigriceps</i>	India, Pakistan	do	E	3	NA	NA
Cahow (= Bermuda Petrel)	<i>Pterodroma cahow</i>	North Atlantic Ocean: Bermuda	do	E	3	NA	NA
Condor, Andean	<i>Vultur gryphus</i>	Colombia to Chile and Argentina	do	E	4	NA	NA
Condor, California	<i>Gymnogyps californianus</i>	U.S.A. (OR, CA), Mexico (Baja California)	U.S.A. only	E	1	17.95(b)	NA
Coot, Hawaiian (= alae keo keo)	<i>Fulica americana alai</i>	U.S.A. (HI)	Entire	E	2	NA	NA
Cotinga, banded	<i>Cotinga maculata</i>	Brazil	do	E	15	NA	NA
Cotinga, white-winged	<i>Xipholena atropurpurea</i>	do	do	E	15	NA	NA
Crane, black-necked	<i>Grus nigricollis</i>	China (Tibet)	do	E	15	NA	NA
Crane, Cuba sandhill	<i>Grus canadensis nesiotis</i>	West Indies: Cuba	do	E	15	NA	NA
Crane, hooded	<i>Grus monacha</i>	Japan, U.S.S.R.	do	E	4	NA	NA
Crane, Japanese	<i>Grus japonensis</i>	China, Japan, Korea, U.S.S.R.	do	E	3	NA	NA
Crane, Mississippi sandhill	<i>Grus canadensis pulla</i>	U.S.A. (MS)	do	E	6	17.95(b)	NA
Crane, Siberian white	<i>Grus leucogeranus</i>	U.S.S.R. (Siberia) to India, including Iran and China	do	E	4	NA	NA
Crane, white-naped	<i>Grus vipio</i>	Mongolia	do	E	15	NA	NA
Crane, whooping	<i>Grus americana</i>	Canada, U.S.A. (Rocky Mountains east to Carolinas), Mexico	do	E	1, 3	17.95(b)	NA
Creepers, Hawaii	<i>Oreomystis (= Loxops) mana</i>	U.S.A. (HI)	do	E	10	NA	NA
Creepers, Molokai (= kakawahie)	<i>Paroreomyza (= Oreomystis, = Loxops) flammea</i>	do	do	E	2	NA	NA
Creepers, Oahu (= alauwahio)	<i>Paroreomyza (= Oreomystis, = Loxops) maculata</i>	do	do	E	2	NA	NA
Crow, Hawaiian (= 'alala)	<i>Corvus hawaiiensis (= tropicus)</i>	do	do	E	1	NA	NA
Crow, Mariana	<i>Corvus kubaryi</i>	Western Pacific Ocean: U.S.A. (Guam, Rota)	do	E	156	NA	NA
Cuckoo-shrike, Mauritius	<i>Coquus (= Coracina) typicus</i>	Indian Ocean: Mauritius	do	E	3	NA	NA
Cuckoo-shrike, Reunion	<i>Coquus (= Coracina) newtoni</i>	Indian Ocean: Reunion	do	E	3	NA	NA
Curassow, razor-billed	<i>Mitu (= Crax) mitu mitu</i>	Brazil (Eastern)	do	E	15	NA	NA
Curassow, red-billed	<i>Crax blumenbachii</i>	Brazil	do	E	4	NA	NA
Curassow, Trinidad white-headed	<i>Pipile pipile pipile</i>	West Indies: Trinidad	do	E	3	NA	NA
Curllew, Eskimo	<i>Numenius borealis</i>	Alaska and northern Canada to Argentina	do	E	1, 3	NA	NA
Dove, cloven-feathered	<i>Drepanoptila holosericea</i>	Southwest Pacific Ocean: New Caledonia	do	E	3	NA	NA
Dove, Grenada gray-fronted	<i>Leptotila rufaxilla wellsi</i>	West Indies: Grenada	do	E	3	NA	NA
Duck, Hawaiian (= koloa)	<i>Anas wyvilliana</i>	U.S.A. (HI)	do	E	1	NA	NA
Duck, Laysan	<i>Anas laysanensis</i>	do	do	E	1	NA	NA
Duck, pink-headed	<i>Rhodonessa caryophyllacea</i>	India	do	E	15	NA	NA
Duck, white-winged wood	<i>Cairina scutulata</i>	India, Malaysia, Indonesia, Thailand	do	E	3	NA	NA
Eagle, bald	<i>Haliaeetus leucocephalus</i>	North America south to northern Mexico	U.S.A. (conterminous States, except WA, OR, MN, WI, MI)	E	1, 34	NA	NA
Do	do	do	U.S.A. (WA, OR, MN, WI, MI)	T	34	NA	17.41(a)

Species		Historic range	Vertebrate population where endangered or threatened	Status	When listed	Critical habitat	Special rules
Common name	Scientific name						
Eagle, Greenland white-tailed.....	<i>Haliaeetus albicilla groenlandicus</i>	Greenland and adjacent Atlantic islands.....	do.....	E	15	NA	NA
Eagle, harpy.....	<i>Harpia harpyja</i>	Mexico south to Argentina.....	do.....	E	15	NA	NA
Eagle, Philippine (= monkey-eating).....	<i>Pithecophaga jefferyi</i>	Philippines.....	do.....	E	3	NA	NA
Eagle, Spanish imperial.....	<i>Aquila heliaca adalberti</i>	Spain, Morocco, Algeria.....	Entire.....	E	3	NA	NA
Egret, Chinese.....	<i>Egretta eulophotes</i>	China, Korea.....	do.....	E	3	NA	NA
Falcon, American peregrine.....	<i>Falco peregrinus anatum</i>	(Nests from central Alaska across north-central Canada to central Mexico, winters south to South America.	do.....	E	2, 3, 145	17.95(b)	NA
Falcon, Arctic peregrine.....	<i>Falco peregrinus tundrius</i>	(Nests from northern Alaska to Greenland; winters south to Central and South America.	do.....	T	2, 3, 145	NA	NA
Falcon, Eurasian peregrine.....	<i>Falco peregrinus peregrinus</i>	Europe, Eurasia south to Africa and Mideast.	do.....	E	15	NA	NA
Falcon, northern aplomado.....	<i>Falco femoralis septentrionalis</i>	U.S.A. (AZ, NM, TX), Mexico, Guatemala.	do.....	E	216	NA	NA
Falcon, peregrine.....	<i>Falco peregrinus</i>	(Worldwide, except Antarctica and most Pacific Islands.	Wherever found in wild in the conterminous 48 States.	E(S/A)	145	NA	NA
Finch, Laysan (honeycreeper).....	<i>Telespyza</i> (= <i>Psittirostra</i>) <i>cantans</i>	U.S.A. (HI).....	Entire.....	E	1	NA	NA
Finch, Nihoa (honeycreeper).....	<i>Telespyza</i> (= <i>Psittirostra</i>) <i>ultima</i>	do.....	do.....	E	1	NA	NA
Flycatcher, Euler's.....	<i>Empidonax euleri johnstonei</i>	West Indies: Grenada.....	do.....	E	3	NA	NA
Flycatcher, Seychelles paradise.....	<i>Terpsiphone corvina</i>	Indian Ocean: Seychelles.....	do.....	E	3	NA	NA
Flycatcher, Tahiti.....	<i>Pomarea nigra</i>	South Pacific Ocean: Tahiti.....	do.....	E	3	NA	NA
Fody, Seychelles (weaver-finch).....	<i>Foudia sechellarum</i>	Indian Ocean: Seychelles.....	do.....	E	3	NA	NA
Frigatebird, Andrew's.....	<i>Fregata andrewsi</i>	East Indian Ocean.....	do.....	E	15	NA	NA
Goose, Aleutian Canada.....	<i>Branta canadensis leucopareia</i>	U.S.A. (AK, CA, OR, WA), Japan.....	do.....	E	1, 3	NA	NA
Goose, Hawaiian (= nene).....	<i>Nesochen</i> (= <i>Branta</i>) <i>sandvicensis</i>	U.S.A. (HI).....	do.....	E	1	NA	NA
Goshawk, Christmas Island.....	<i>Accipiter fasciatus natalis</i>	Indian Ocean: Christmas Island.....	do.....	E	3	NA	NA
Grackle, slender-billed.....	<i>Quiscalus</i> (= <i>Cassidix</i>) <i>palustris</i>	Mexico.....	do.....	E	3	NA	NA
Grasswren, Eyrean (flycatcher).....	<i>Amytornis goyderi</i>	Australia.....	do.....	E	3	NA	NA
Grebe, Atitlan.....	<i>Podilymbus gigas</i>	Guatemala.....	do.....	E	3	NA	NA
Greenshank, Nordmann's.....	<i>Tringa guttifer</i>	U.S.S.R., Japan, south to Malaya, Borneo.	do.....	E	15	NA	NA
Guan, horned.....	<i>Oreophasis derbianus</i>	Guatemala, Mexico.....	do.....	E	3	NA	NA
Gull, Audouin's.....	<i>Larus audouinii</i>	Mediterranean Sea.....	do.....	E	3	NA	NA
Gull, relict.....	<i>Larus relictus</i>	India, China.....	do.....	E	15	NA	NA
Hawk, Anjouan Island sparrow.....	<i>Accipiter francesii pusillus</i>	Indian Ocean: Comoro Islands.....	do.....	E	3	NA	NA
Hawk, Galapagos.....	<i>Buteo galapagoensis</i>	Ecuador (Galapagos Islands).....	do.....	E	3	NA	NA
Hawk, Hawaiian (= io).....	<i>Buteo solitarius</i>	U.S.A. (HI).....	do.....	E	1	NA	NA
Hermit, hook-billed (hummingbird).....	<i>Glaucis</i> (= <i>Ramphodon</i>) <i>dohrnii</i>	Brazil.....	do.....	E	15	NA	NA
Honeycreeper, crested (= 'akohekohe).....	<i>Palmeria dolei</i>	U.S.A. (HI).....	do.....	E	1	NA	NA
Hornbill, helmeted.....	<i>Rhinoplax vigil</i>	Thailand, Malaysia.....	do.....	E	15	NA	NA
Honeyeater, helmeted.....	<i>Meliphaga cassidix</i>	Australia.....	do.....	E	4	NA	NA
Ibis, Japanese crested.....	<i>Nipponia nippon</i>	China, Japan, U.S.S.R., Korea.....	do.....	E	3	NA	NA
Kagu.....	<i>Rhynochetos jubatus</i>	South Pacific Ocean: New Caledonia.....	do.....	E	3	NA	NA
Kakapo (= owl-parrot).....	<i>Strigops habroptilus</i>	New Zealand.....	do.....	E	3	NA	NA
Kestrel, Mauritius.....	<i>Falco punctatus</i>	Indian Ocean: Mauritius.....	do.....	E	3	NA	NA
Kestrel, Seychelles.....	<i>Falco araea</i>	Indian Ocean: Seychelles Islands.....	do.....	E	3	NA	NA
Kingfisher, Guam Micronesian.....	<i>Halcyon cinnamomina cinnamomina</i>	Western Pacific Ocean: U.S.A. (Guam).....	do.....	E	156	NA	NA
Kite, Cuba hook-billed.....	<i>Chondrohierax uncinatus wilsonii</i>	West Indies: Cuba.....	do.....	E	3	NA	NA
Kite, Everglade snail.....	<i>Rostrhamus sociabilis plumbeus</i>	U.S.A. (FL), Cuba.....	Florida.....	E	1	17.95(b)	NA
Kite, Grenada hook-billed.....	<i>Chondrohierax uncinatus mirus</i>	West Indies: Grenada.....	Entire.....	E	3	NA	NA

REFERENCE 41



Surface Water Classifications

Surface Water Quality Standards
N.J.A.C. 7:9-4

May 1985

State of New Jersey Department of Environmental Protection/Division of Water Resources

PIGEON SWAMP (S. Brunswick) - All waters within the boundaries of Pigeon Swamp State Park	FW2-NT(C1)
PIKE RUN (Belle Meade) - Entire length	FW2-NT
PINE BROOK (Clarks Mills) - Entire length	FW2-NT
PINE BROOK (Cooks Mill) - Entire length	FW2-TM
PLEASANT RUN (Readington) - Entire length	FW2-NT
PRESCOTT BROOK (Stanton Station) - Entire length	FW2-TM
★ RAMANESSIN [HOP] BROOK (Holmdel) - Entire length	FW2-TM
RARITAN BAY - Entire Drainage	FW2-NT/SE1
RARITAN RIVER	
NORTH BRANCH (Also see INDIA BROOK)	
(Pleasant Valley) - Source to, but not including, Ravine Lake	FW2-TP(C1)
(Far Hills) - Ravine Lake dam to Rt. 512 bridge	FW2-TM
(Bedminster) - Rt. 512 bridge to confluence with South Branch, Raritan River	FW2-NT
SOUTH BRANCH RARITAN RIVER	
(Mt. Olive) - Source to the dam that is 390 feet upstream of the Flanders-Drakestown Road bridge	FW2-NT(C1)
(Mt. Olive) - Dam to confluence with Turkey Brook	FW2-TM(C1)
(Naughtright) - Confluence with Turkey Brook to confluence with Electric Brook	FW2-TP(C1)
(Clinton) - Confluence with Electric Brook to downstream end of Packers Island, except segment described separately, below	FW2-TM
(Ken Lockwood Gorge) - River and tributaries within Ken Lockwood Gorge Wildlife Management Area	FW2-TM(C1)
(Neshanic Sta.) - Downstream end of Packers Island to confluence with North Branch, Raritan River	FW2-NT
MAIN STEM RARITAN RIVER	
(Bound Brook) - From confluence of North and South Branches to Landing Lane bridge in New Brunswick and all fresh-water tributaries downstream of Landing Lane bridge.	FW2-NT
(Sayreville) - Landing Lane bridge to Raritan Bay and all saline water tributaries	SE1
RINEHART BROOK (Hacklebarney) - Entire length	FW2-TP(C1)
ROCK BROOK (Montgomery) - Entire length	FW2-NT
ROCKAWAY CREEK	
NORTH BRANCH	
(Mountainville) - Source to Rt. 523 bridge	FW2-TP(C1)
(Whitehouse) - Rt. 523 bridge to confluence with South Branch	FW2-TM

once-through basis for the duration of the test, in accordance with N.J.A.C. 7:18.

"Fresh water(s)" means all nontidal and tidal waters generally having a salinity, due to natural sources, of less than or equal to 3.5 parts per thousand at mean high tide.

"FW" means the general surface water classification applied to fresh waters.

"FW1" means those fresh waters that originate in and are wholly within Federal or State parks, forests, fish and wildlife lands, and other special holdings, that are to be maintained in their natural state of quality (set aside for posterity) and not subjected to any man-made wastewater discharges, as designated in Index A incorporated into this subchapter.

☆ "FW2" means the general surface water classification applied to those fresh waters that are not designated as FW1 or Pinelands Waters.

"Heat dissipation area" means a mixing zone, as may be designated by the Department, into which thermal effluents may be discharged for the purpose of mixing, dispersing, or dissipating such effluents without creating nuisances, hazardous conditions, or violating the provisions of this subchapter.

"Hypolimnion" means the lower region of a stratified waterbody that extends from the thermocline to the bottom of the waterbody, and is isolated from circulation with the upper waters, thereby receiving little or no oxygen from the atmosphere.

"Important species" means species that are commercially valuable (e.g., within the top ten species landed, by dollar value); recreationally valuable; threatened or endangered; critical to the organization and/or maintenance of the ecosystem; or other species necessary in the food web for the well-being of the species identified in this definition.

"Industrial water supply" means water used for processing or cooling.

"Intermittent stream" means a stream with a MA7CD10 flow of less than one-tenth (0.1) cubic foot per second.

"Lake, pond, or reservoir" means any impoundment, whether naturally occurring or created in whole or in part by the building of structures for the retention of surface water, excluding sedimentation control and stormwater retention/detention basins.

"LC50" means the median lethal concentration of a toxic substance, expressed as a statistical estimate of the concentration that kills 50 percent of the test organisms under

"Secondary contact recreation" means recreational activities where the probability of water ingestion is minimal and includes, but is not limited to, boating and fishing.

"Shellfish" means those mollusks commonly known as clams, oysters, or mussels.

"Shellfish waters" means waters classified as Approved, Seasonally Approved, Special Restricted, Seasonally Special Restricted or Condemned that support or possess the potential to support shellfish which are within the Coastal Area Facility Review Act (C.A.F.R.A.) zone as delineated in 1973, (excluding: 1 - The Cohansey River upstream of Brown's Run; 2 - The Maurice River upstream of Route 548; 3 - The Great Egg Harbor River upstream of Powell Creek; 4 - The Tuckahoe River upstream of Route 50; 5 - The Mullica River upstream of the Garden State Parkway) plus the adjacent areas between Route 35 (from its juncture with the C.A.F.R.A. zone just north of Red Bank to its juncture with the C.A.F.R.A. zone just south of Keyport) and the C.A.F.R.A. zone and the area from the C.A.F.R.A. zone on the south northwesterly along Route 35 to the northern shore of the Raritan River, then easterly along the northern shore of the Raritan River to the southeast point of Perth Amboy, the due east to the New Jersey jurisdictional limit, and seaward along the jurisdictional limit to the Atlantic Ocean.

"Stream temperature" means the temperature of a stream outside of a designated heat dissipation area.

"Surface water classifications" means names assigned by the Department in this subchapter to waters having the same designated uses and water quality criteria (e.g. FW1, PL, FW2-NT, SE1, SC, Zone 1C).

"Thermal alterations" means the increase or decrease in the temperature of surface waters, above or below the natural, that may be caused by the activities of man.

"Thermocline" means the plane of maximum rate of change in temperature with respect to depth.

"Tidal waters" means fresh or saline water under tidal influence, up to the head of tide.

☆ "TM" means trout maintenance.

"TP" means trout production.

"Total residual chlorine" means the sum of the free and combined chlorine fractions that can be detected by methods approved under N.J.A.C. 7:18.

"Toxic substances" means those substances, or combination of substances, which upon exposure, ingestion, inhalation or

assimilation into any organism, either directly from the environment or indirectly through food chains, will, on the basis of the information available to the Department, cause death, disease, behavioral abnormalities, cancer, genetic mutations, physiological malfunctions, including malfunctions in reproduction, or physical deformation, in such organisms or their offspring.

☆ "Trout maintenance waters" means waters designated in this subchapter for the support of trout throughout the year.

"Trout production waters" means waters designated in this subchapter for use by trout for spawning or nursery purposes during their first summer.

"USEPA" means the United States Environmental Protection Agency.

"Water quality based effluent limitations" means effluent limitations established so that the quality of the waters receiving a discharge will meet the Water Quality Criteria and Policies of this subchapter after the introduction of the treated wastewaters.

"Zone" means the general surface water classification applied to the mainstem Delaware River and Delaware Bay.

7:9-4.5 Statements of policy

(a) General policies are as follows:

1. These Surface Water Quality Standards apply to all surface waters of the State.
2. Water is vital to life and comprises an invaluable natural resource which is not to be abused by any segment of the State's population or economy. It is the policy of the State to restore, maintain and enhance the chemical, physical and biological integrity of its waters, to protect the public health, to safeguard the aquatic biota, protect scenic and ecological values, and to enhance the domestic, municipal, recreational, industrial, agricultural and other reasonable uses of the State's waters.
3. Toxic substances in waters of the State shall not be at levels that are toxic to humans or the aquatic biota, or that bioaccumulate in the aquatic biota so as to render them unfit for human consumption.
4. The introduction of substances into the waters of the State in concentrations that are known to be carcinogenic, mutagenic, or teratogenic shall not be permitted. The Department shall direct its control efforts to require the removal of such substances from

REFERENCE 42

GEMS> I

ATT BELL LABORATORIES-HOLMDEL

LATITUDE 40:21:50 LONGITUDE 74:10:26 1980 POPULATION

KM	0.00-.400	.400-.810	.810-1.60	1.60-3.20	3.20-4.80	4.80-6.40	SECTOR TOTALS
S 1	670	0	0	3962	10109	28647	43388
RING	670	0	0	3962	10109	28647	43388
TOTALS							

GEMS> I

ATT BELL LABORATORIES-HOLMDEL

LATITUDE 40:21:50 LONGITUDE 74:10:26 1980 HOUSING

KM	0.00-.400	.400-.810	.810-1.60	1.60-3.20	3.20-4.80	4.80-6.40	SECTOR TOTALS
S 1	186	0	0	1030	2788	8417	12421
RING	186	0	0	1030	2788	8417	12421
TOTALS							

DISTANCE (MILES)	POPULATION	HOUSING
0.25	670	186
0.50	670	186
1.00	670	186
2.00	4632	1216
3.00	14741	4004
4.00	43388	12421

REFERENCE 43

CONTROL NO:

DATE:

8/22/89

TIME:

1550

DISTRIBUTION:

BETWEEN:

OF:

RCRA Hotline

PHONE:

1 (800) 424-9346

AND:

P. LaBue

(NUS)

DISCUSSION:

Q: Are CERCLA response authorities eligible for leaks of petroleum from underground fuel delivery systems?

A: No. Releases from USTs are regulated under RCRA Subtitle I

Q: Are there any circumstances where CERCLA can respond to a petroleum leak?

A: Yes. If petroleum products are spilled onto water and leave a sheen on the water, a CERCLA emergency response can be authorized by the President or Regional Administrator.

ACTION ITEMS:

REFERENCE 44

Thursday
April 4, 1985

I

federal register

Selected Subjects

Air Pollution Control

Environmental Protection Agency

Aviation Safety

Federal Aviation Administration

Bridges

Coast Guard

Chemicals

Environmental Protection Agency

Civil Rights

National Aeronautics and Space Administration

Communications Common Carriers

Federal Communications Commission

Fisheries

National Oceanic and Atmospheric Administration

Flood Insurance

Federal Emergency Management Agency

Government Procurement

Defense Department

General Services Administration

National Aeronautics and Space Administration

Imports

Animal and Plant Health Inspection Service

Inventions and Patents

Commerce Department

CONTINUED INSIDE

suant to the Atomic Energy Act of 1954.

First Federal official means the first Federal representative of a participating agency of the National Response Team to arrive at the scene of a discharge or a release. This official coordinates activities under this Plan and may initiate, in consultation with the OSC, any necessary actions until the arrival of the predesignated OSC. A State with primary jurisdiction over a site covered by a cooperative agreement will act in the stead of the First Federal official for any incident at the site.

Fund or Trust Fund means the Hazardous Substance Response Trust Fund established by section 221 of CERCLA.

Ground water, as defined by section 101(12) of CERCLA, means water in a saturated zone or stratum beneath the surface of land or water.

Hazardous substance, as defined by section 101(14) of CERCLA, means: Any substance designated pursuant to section 311(b)(2)(A) of the CWA; any element, compound, mixture, solution, or substance designated pursuant to section 102 of CERCLA; any hazardous waste having the characteristics identified under or listed pursuant to section 3001 of the Solid Waste Disposal Act (but not including any waste the regulation of which under the Solid Waste Disposal Act has been suspended by Act of Congress); any toxic pollutant listed under section 307(a) of the CWA; any hazardous air pollutant listed under section 112 of the Clean Air Act; and any imminently hazardous chemical substance or mixture with respect to which the Administrator has taken action pursuant to section 7 of the Toxic Substances Control Act. The term does not include petroleum, including crude oil or any fraction thereof, which is not otherwise specifically listed or designated as a hazardous substance in the first sentence of this paragraph, and the term does not include natural gas, natural gas liquids, liquefied natural gas or synthetic gas usable for fuel (or mixtures of natural gas and such synthetic gas).

Inland waters, for the purposes of classifying the size of discharges,

means those waters of the U.S. in the inland zone, waters of the Great Lakes, and specified ports and harbors on inland rivers.

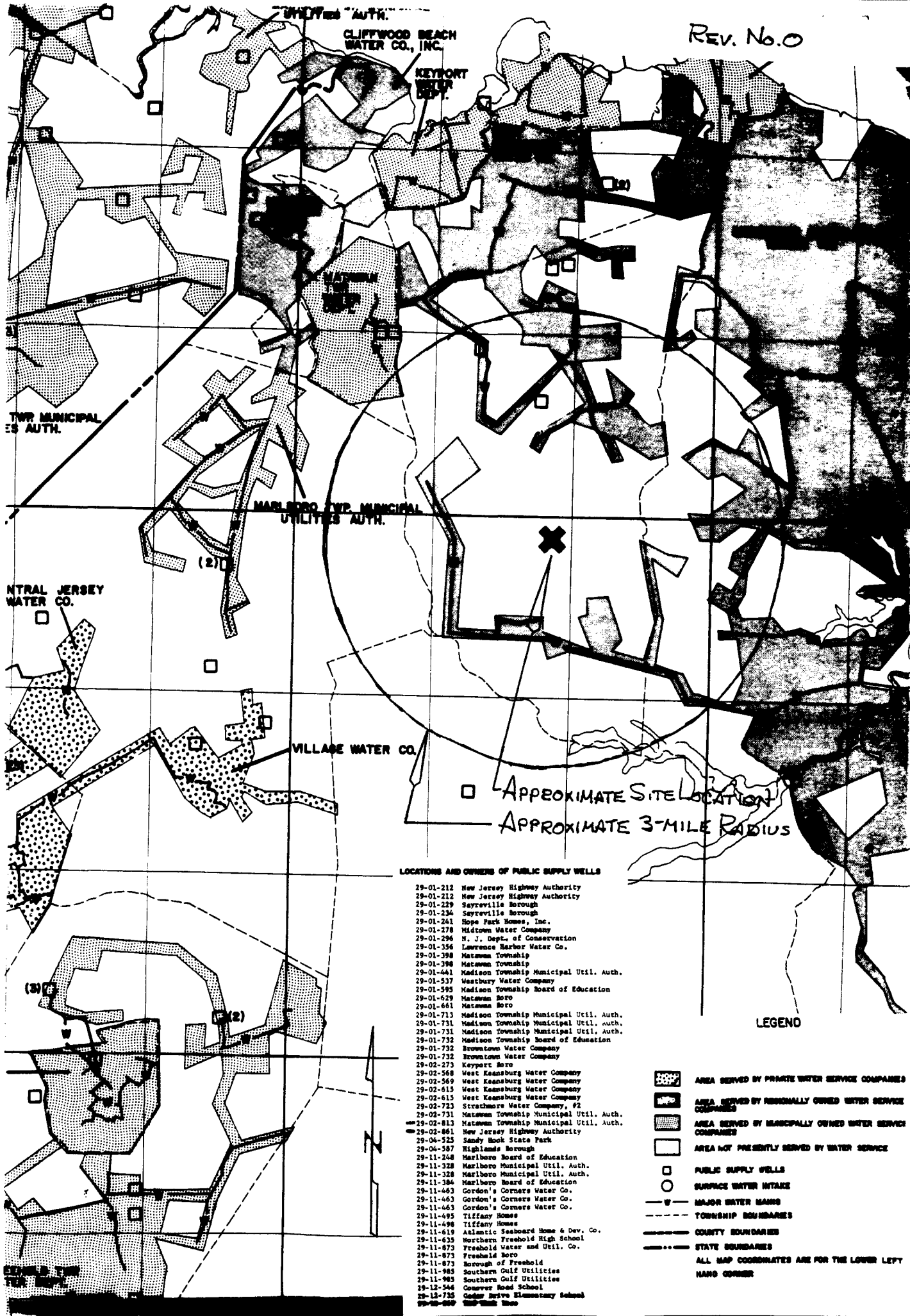
Inland zone means the environment inland of the coastal zone excluding the Great Lakes and specified ports and harbors of inland rivers. The term inland zone delineates the area of Federal responsibility for response action. Precise boundaries are determined by EPA/USCG agreement and identified in Federal regional contingency plans.

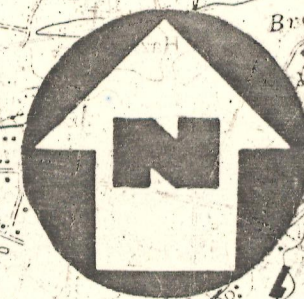
Lead agency means the Federal agency (or State agency operating pursuant to a contract or cooperative agreement executed pursuant to section 104(d)(1) of CERCLA) that has primary responsibility for coordinating response action under this Plan. A Federal lead agency is the agency that provides the OSC or RPM as specified elsewhere in this Plan. In the case of a State as lead agency, the State shall carry out the same responsibilities delineated for OSCs/RPMs in this Plan (except coordinating and directing Federal agency response actions).

Management of migration means actions that are taken to minimize and mitigate the migration of hazardous substances or pollutants or contaminants and the effects of such migration. Management of migration actions may be appropriate where the hazardous substances or pollutants or contaminants are no longer at or near the area where they were originally located or situations where a source cannot be adequately identified or characterized. Measures may include, but are not limited to, provision of alternative water supplies, management of a plume of contamination, or treatment of a drinking water aquifer.

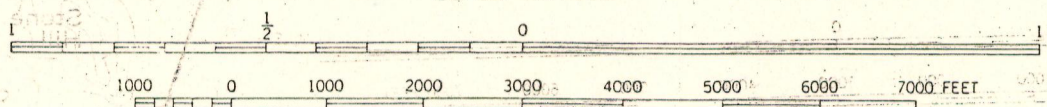
Natural resources, as defined by section 101(16) of CERCLA, means land, fish, wildlife, biota, air, water, ground water, drinking water supplies, and other such resources belonging to, managed by, held in trust by, appertaining to, or otherwise controlled by the United States (including the resources of fishery conservation zones established by the Magnuson Fishery Conservation and Management Act), any State or local government, or any foreign government.

REFERENCE 45






SCALE 1:24000



CONTOUR INTERVAL 20 FEET

	TITLE: THREE MILE VICINITY MAP	
	SITE: AT&T BELL LABORATORIES, HOLMDEL, N.J.	
DATE: 10/3/89	FIGURE NUMBER:	
TOD: 02-8909-14	SCALE: 1"=2000'	
QUAD: MARLBORO, N.J.		